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ABSTRACT

A study examined the American experience of accrediting employer-provided training. Interviews were conducted with 16 persons: 2 representatives of accrediting agencies, 9 representatives of employers with accredited training programs, and 5 persons with expertise in a closely related field. Based on these interviews, it appeared that where there are close analogues for an employer-provided training course it can be evaluated for academic equivalence. A sizable percentage of employer-provided training is, however, focused primarily on job competence and other corporate objectives. This renders many such courses unsuitable for assessments that are based on the academic criteria and language that are fundamental to accrediting agencies. Many of those interviewed felt that recommendation for college credit is a successful way of improving access to academic institutions, motivating employees by enabling them to acquire academic qualifications in the absence of other professional recognition, and enhancing the morale and quality of some corporate training departments. Penetration of accreditation into the area of employer-provided training has, to date, been very limited in relation to the total amount of such training provided. Although an increase in the number of programs accredited is anticipated, the rate of increase is not expected to be very great. It appears that a policy of awarding industry credit would reflect the objectives and nature of most employer-provided training in a way that college credit can never do. (Appendixes include an outline of the conduct of the study and recommended accreditation program policies and procedures.) (MN)

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The Consortium for Advanced Continuing Education and Training

Paper No. 4

AMERICAN EXPERIENCE OF ACCREDITATION OF EMPLOYER-PROVIDED TRAINING

Tony Chaplin and Keith Drake

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AMERICAN EXPERIENCE OF ACCREDITATION

OF EMPLOYER-PROVIDED TRAINING

by

TONY CHAPLIN

and

KEITH DRAKE

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PICKUP stands for Professional, Industrial and Commercial Updating. The programme was launched by the Department of Education and Science in 1982. It covers England and Wales, and in Scotland there is now an allied programme of PICKUP Partnership Projects. PICKUP aims to help colleges, polytechnics and universities to increase and improve the work they do in meeting the adult training, updating and retraining needs of employers and their workforces.

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1. SUMMARY

For more than ten years the University of the State of New York and the American Council on Education have each operated a very similar Program on Noncollegiate Sponsored Instruction. Their review teams have evaluated several thousand employer-provided training courses and made recommendations for college credit, on the basis of which colleges in virtually all States are reported to have granted credit. During a brief visit and sixteen interviews in 1986 it was possible to sample the experience of the two accrediting agencies, of some of the organisations whose courses have been reviewed and recommended for credit, and of a group of detached experts.

Where there are close academic analogues for an employer-provided training course it can be accurately evaluated for academic equivalence. The credit recommendations are accurate in the sense that, within the normal margins of error in higher education, they represent the academic attainments produced by the training and they do so consistently.

However, a proportion of employer-provided training is focussed on job competence and other corporate objectives. This renders some of it unsuitable for assessment using the academic criteria and language which are fundamental to the evaluative procedures of the two accrediting agencies. Recommendation for college credit is regarded as a successful way of improving access to academic institutions, motivating some employees by enabling them to acquire an academic qualification in the absence of other professional recognitions and enhancing the morale and quality of some corporate training departments. Its penetration of employer-provided training has been very limited in relation to the total size of that training. Further extension is anticipated, but it is not generally expected to grow by an order of magnitude.

Recommendation for college credit is part of a much larger issue, which is quality assurance of employer-provided training. Since most of that training has non-academic objectives any attempt to set and measure to appropriate standards requires industry credit rather than college credit.

Industry credit would reflect the objectives and nature of the bulk of employer-provided training in a way which college credit can never do. It would often focus on job competence

as its key criterion, not on mastery of academic knowledge and skills and not on the relationship of these to jobs. In both the United States and the United Kingdom scattered examples of industry credit can be found. But its systematisation - relating qualification to jobs - and its extension into a comprehensive means of guaranteeing training quality has not occurred and certainly does not match the reliability and validity of quality assurance in higher education.

The Consortium for Advanced Continuing Education and Training is recommended

(1) to consider establishing an agency to evaluate and recommend employer-provided training courses for academic credit; and

(2) to offer itself to employer associations and the public authorities as the centre for a research and development programme on competence-based accreditation of employer-provided training, i.e. industry credit, and its relation to academic credit.

2. INTRODUCTION AND OBJECTIVES

This report was commissioned by the Consortium for Advanced Continuing Education and Training (CONTACT) and financed by the Department of Education and Science under its professional, industrial and commercial updating (PICKUP) programme. The five partners of CONTACT are the Universities of Manchester and Salford, the University of Manchester Institute of Science and Technology, the Manchester Polytechnic and the Manchester Business School (hereafter The Five).

In establishing CONTACT, The Five aim to increase the quantity and improve the quality of adult learning opportunities in higher education; to increase access to, and use of, the resources of The Five in all forms of continuing education and training; and to co-ordinate and make more economical the provision of continuing education. In 1986, when CONTACT was launched, DES PICKUP provided monies for five studies to inform and guide CONTACT's early development, and the Leverhulme Trust financed a sixth study. Three of these studies explored dimensions of the demand for the kinds of professional, industrial and commercial updating programmes which The Five already provide and can enhance. Two studies investigated (i) employee perceptions of those interventions most likely to increase take-up of advanced PICKUP opportunities in the North West, and (ii) the interventions by employers and by The Five which were most likely to enhance take-up of these PICKUP opportunities. These two studies were combined in a single report, based on a survey of sixty-six employers in the North West, and published as CONTACT Paper No. 2 (Clendon and Yorke, 1986). A third demand study - the subject of this report - examined experience in the United States with the accreditation of employer-provided training. Three more studies were established to explore aspects of the supply of advanced continuing education and training: the development of modularisation in the member institutions, CONTACT Paper No. 1 (Squires, 1986); distance learning techniques in continuing education and training in Sweden and Denmark, reported as CONTACT Paper No. 3 (Jones, 1986); and the Leverhulme-financed study of in-course credit recognition between the member institutions, which is due to report in 1987.

The terms of reference of this study were to report on the potential applicability of, and required modifications to, currently operating schemes of accreditation of employer-

provided training in the United States with a view to the possibility of establishing a British development project jointly between employers and educational institutions. In order to do this the authors decided

- to visit the main accrediting agencies, collect documentation and data, and discuss their accreditation experience with staff;

- to visit some employers whose training programmes are accredited through these agencies, and seek their advice as to the expected and achieved corporate costs and benefits of such accreditation;

- to seek out another perspective from those whose knowledge and detachment from the accreditation process enable them to assess the significance and potential of such accreditation within the whole range of measures to articulate and increase employee demand for training which are available in the United States to employers and to government.

The conduct of this study is described in greater detail in the Appendix, but two features should be emphasised here. First, terms of reference are best understood in the context of the six CONTACT development projects mentioned above. These projects were designed to assist the Consortium in deciding its strategy for developing both the demand for and the supply of advanced continuing education and training in the North West. On the supply side, some of the key concerns were access, flexibility and economy of provision and complementarity between employment-based training and training in academic institutions. The study of American experience with accreditation of employer-based training was envisaged as one means of addressing the issue of access and of impediments to access faced by adults, but also as another facet of that mutual recognition of learning in other settings which is being addressed by the project on in-course credit recognition between The Five. Failure to tap the great pool of adult ability has long been recognised by adult educators as a national scandal from which the economy, our society and individuals suffer. To exploit that pool of ability it is necessary for educational institutions not merely to give more adequate mutual recognition to each other's qualifications, but also to give appropriate recognition to learning in the very large shadow education system run by employers.

Open learning has been described as an attitude of mind, to distinguish it from distance learning, which is a technique. But it is also an organisational state, where learning is decompartmentalised and derestricted. Work-based learning

which is the object of well-established, formal training programmes provided by employers may be the form of learning outside educational institutions which is most amenable to some kind of assessment which helps educational institutions to recognise - give credit to - extrainstitutional learning. The launch of CONTACT by the member institutions signalled their determination to open their resources in aid of learning. Certainly, it signalled an attitude of mind; but it also began a process of derestriction. This consideration of American experience is only one of CONTACT's initial steps towards a far-reaching and multi-faceted programme of organisational change which will increase access to one of the most restricted and yet most prized of economic goods, which is knowledge.

Second, CONTACT's interest in American experience with accreditation of employer-based training goes beyond the concern of vendors to develop the market for their services by converting latent into actual demand. It has long been a characteristic of the formal education system in the United Kingdom that provision is supplier-dominated; and this has been particularly true where the would-be learners are adults whose busy lives at work and at home make the feasibility of institution-based long-term learning projects dependent on variety of entry points and access modes, and on the sensitivity of delivery systems to the fluctuating but severe constraints of working hours and family life. CONTACT is profoundly concerned to change the way its fine and (potentially) versatile resources for continuing education and training are used. Of course, even now it is not a pure supplier-dominated system. Throughout The Five there is a long tradition and practice of sensitivity towards both employer and individual demand, with some exciting recent innovations. The Five are nevertheless concerned to reach out much more effectively to the very large numbers of people who could benefit from their instructional services, wish to do so, but are unable to participate because of avoidable inflexibilities and restrictions in access and in provision. This study is just one sign of a wholesale change of emphasis in The Five towards a more client-centred and demand-driven provision.

A more client-centred approach requires, amongst other things, changes in policy and practice with respect to access, scheduling, location and pricing of provision, exploitation of new educational technologies, modularisation, credit accumulation and transfer. This particular study focuses on just one aspect of credit accumulation and transfer. Changes in worklife are frequent for adults, and for many these changes are likely to become more frequent (see Aslanian, 1980; Barton, 1982; Evans, 1984). This is especially so for the more educated or trained adults who are

generally the clientele for advanced continuing education and training. The half life of professionals in fields like computer science is down to four or five years; and for very large numbers of qualified and highly qualified people regular updating or retraining is coming to be recognised as a necessity before it is a universal reality. Interruption of studies due to fluctuating work or domestic pressures or to geographical relocation is equally common, but educational institutions in this country, especially universities, have done little to accommodate this. Public sector higher education is capitalising on the advantage bestowed by having one national validating body, the Council for National Academic Awards. Through its Credit Accumulation and Transfer Scheme (CATS) the Council for National Academic Awards is able to mount a nation-wide initiative which combines the prospect of (i) award-bearing courses which are more tailor-made to individual learning objectives than CNAA's off-the-peg variety, (ii) transferability of credit gained in public sector higher education from one institution or one part of the country to another, and (iii) a move towards a more common and standardised granting of credit - or advanced standing - for some kinds of employer-provided training and even for experiential learning.

This very ambitious initiative reflects a major push to make public sector provision more client-centred. The universities constitute over forty autonomous validating bodies. The absence of one comprehensive validating body for the university sector is sometimes regarded as a serious barrier to progress. But in Greater Manchester The Five, who are an epitome of the higher education system, regard this asymmetry as an opportunity to discover ways of relating to each other without destroying the valuable institutional differences which can be the strength of a heterogeneous system of higher education. The Manchester Polytechnic has unrivalled experience of CNAA validating practice and very close collaboration with CATS. The University of Manchester, Manchester Business School and UMIST are part of the same validating body, the single academic University of Manchester; and the University of Salford is another totally autonomous award-giving authority. One of their earliest decisions was to increase educational product compatibility by exploring simultaneously the recognition for credit of each other's courses - the Leverhulme In-Course Credit Recognition Project - and recognition for credit of employer-provided training. In this way The Five can begin both to improve collaboration between educational institutions and between the institutions and employers, while enhancing the learning options for individuals and limiting any disadvantages to individuals from inevitable interruptions to their studies. The recognition of extrainstitutional learning during employer-based training may become important

for entry, i.e. as one of several alternative means of assessing the individual's readiness to benefit from higher education. But greater institutional recognition of that learning could be equally important for its effect on the confidence of millions of adults in their ability and on their motivation to undertake degree level studies. Lack of confidence in their own ability has always been one of the major inhibitors in adult decision-making about their own learning. To recognise achievement in extrainstitutional learning, as an indicator of potential for degree work or as a part-qualification towards a degree, is vital if the pool of adult ability is really to be tapped.

The objectives of this study were, therefore, to see what could be learned (during a very short visit) about American experience of accrediting employer-provided training; and to convert these lessons into suggestions on further moves by The Five towards arrangements for credit recommendations which might encompass and bring into closer partnership employer, public sector and university providers of advanced continuing education and training. Time and other resources were very limited. As is made clear in the Appendix on the conduct of the study, this report is in consequence a very personal view from the joint authors. A qualitative study of this kind can only be impressionistic; its conclusions and suggestions are tentative contributions to the Consortium's thinking in an important but difficult area of development.

3. REPORT

3.1 Definitions

The purpose of our highly selective sampling of American experience with accreditation of employer-provided training was to take a view on the usefulness of that experience to British employers and educational institutions as they develop new forms of collaboration. From the outset it was clear that American experience offers us some important caveats. Even the word accreditation was a problem. It is not normal American practice to talk of accreditation of employer-provided training. The two principal agencies, the American Council on Education (ACE) and the University of the State of New York (USNY), describe their role as evaluation of noncollegiate training courses in order to offer guidance on educational credit. They always emphasise that they do not award credit. They simply make credit recommendations with respect to certain training programmes. This is what we mean whenever we use the word accreditation in this text. So, in referring to accrediting agencies we mean only that these two agencies evaluate and then make credit recommendations.

To increase the difficulty, in the United Kingdom there is at present a move to restrict the meaning of accreditation to recognition of bodies, institutions or their procedures (see HMSO, 1986). The Working Group which produced the Review of Vocational Qualifications in England and Wales defined validation as 'the process of scrutinising a proposed course and of deciding whether or not it should be approved as being of an appropriate nature and standard for the award to which it is intended to lead' (HMSO, 1986, p.61). Using that definition, ACE and USNY might perhaps be described as validating rather than accrediting employer-provided training, even though this would be for an award to which it was not originally intended to lead, for example an academic degree. However, we have preferred not to follow the Working Group but to stay with the more common British usage in which **accreditation means formal recognition that a defined learning programme meets certain specified requirements, and - in this instance - results in a credit recommendation.**

It is employer-provided training that is the focus of our interest. **By training we mean the provision of planned learning experiences which enable trainees to develop specified task, job or occupational competences.** In

particular, our investigation revolved around the practices of the American Council on Education Program on Noncollegiate Sponsored Instruction (ACE PONSI) and the University of the State of New York Program on Noncollegiate Sponsored Instruction (USNY PONSI). Their essentially similar functions may be clarified through their own words. ACE describes PONSI thus:

'The purpose of the Program on Noncollegiate Sponsored Instruction (PONSI) is to help adults obtain academic credit for learning acquired outside the sponsorship of colleges and universities. The resulting evaluations provide educational institutions with reliable information to use in making decisions on credit awards. The Program evaluates and makes credit recommendations for formal educational programs and courses sponsored by noncollegiate organizations who are non-degree granting and who offer courses to their employees, members, or customers. These noncollegiate organizations include business and industry, labor unions, professional and voluntary associations, and government agencies. The credit recommendations are intended to guide and assist colleges and universities as they consider awarding credit to persons who have successfully completed noncollegiate sponsored instruction. In this way, students will be assisted in receiving academic credit for learning gained through such instruction.

The Program is based on the proposition that it is sound educational practice for colleges and universities to recognize and grant academic credit for quality educational programs conducted by noncollegiate organizations. Experience has shown that awarding credit for prior learning has in many cases motivated students to enroll in formal postsecondary programs of study.

The Program was begun in July 1974, upon the recommendation of the Carnegie Commission on Nontraditional Study that the American Council on Education's system of evaluating formal courses offered by the armed services be extended to civilian organizations. The criteria and procedures that ACE has used and updated since 1945 in evaluating military courses were adapted for use by the Program on Noncollegiate Sponsored Instruction.'

A sample course exhibit is taken from USNY PONSI's College Credit Recommendations (1985, pp 107-108), but similar examples, and for sub-degree or baccalaureate levels, might have been taken from ACE PONSI's National Guide to Educational Credit for Training Programs. The sample course is the second company-taught course in a three year advanced engineering course which alternates company-based and formal on-campus academic study leading to the company's Advanced

Course Certificate:

'**Location:** Avionic and Electronics Systems Division, Syracuse, NY.

Length: 128 hours (32 weeks spread over 2 semesters); approximately 636 hours are devoted to problem solving outside of class.

Dates: June 1985 - Present.

Objective: To teach classical communications theory and systems, and signal processing on selected current engineering problems.

Instruction: Semester 1: Fourier transforms and spectral analysis; random processes; complex envelope notation and Hilbert transforms; signal spaces; signals and modulation theory; noise in modulation systems; receiver design; sampling theory; quantization errors; information theory and coding; introduction to error correcting codes; pulse modulation techniques; acoustic propagation in the ocean; Fourier optics; Markov processes; queuing theory. **Semester 2:** Detection and estimation theory; parameter estimation; waveform design aspects involving resolution and ambiguity; introduction to sonar systems; sonar signal processing; correlation sonar; Kalman filters; introduction to phased array concepts; adaptive array processing; radar fundamentals; radar array antennas; waveform design and radar signal processing; electronic counter-measures; radar electronic counter-counter measures (ECCM); cylindrical arrays; infrared engineering. Assigned problems support the classwork, are completed outside of class, and are submitted to the course supervisor and to peers for review. (Prerequisite: A-Course).

Credit recommendation: In the graduate degree category, 8 semester hours in Communications Theory and Systems or Signal Processing (6/85 re-evaluation).'

3.2 Origins and Development of Progams on Noncollegiate Sponsored Instruction

The genesis and history of the agencies which now accredit employer-provided training in the United States is well documented (see for example USNY 1985, pp 1-7, Spille 1980, McGarraghy and Reilly 1981) USNY PONSI was established in 1974 by the Board of Regents of the University of the State of New York, the overarching governing body for all academic programmes at all levels in all educational institutions in New York State, though the programme - USNY PONSI - is now national in scope in the sense that its activities have

spread beyond the borders of New York. It now serves 190 organisations in eighteen States and has evaluated and recommended for credit over 2,200 courses. Some 1,300 colleges in forty-nine states are reported to be granting credit based on its credit recommendations. The Regents modelled it very much after ACE's way of evaluating military courses, which has a much longer history. So it is not surprising that the USNY and ACE versions of PONSI are rather similar. Indeed, there was a three year period (1974-77) when the programmes operated jointly in developing the systems of evaluation and credit recommendations. Both continue to use these systems with only slight variations, for example ACE using entirely academic evaluating teams and USNY a mixture of academic and employer specialists. The two agencies split in 1977. ACE is a different kind of creature from USNY. USNY - strictly the Board of Regents - is an accrediting authority recognised by the US Office of Education. Accreditation may not normally be a governmental function, but the State of New York is sui generis. ACE was branching out into other states and seeking to establish satellites in them, which is not really part of the remit of the Board of Regents. So constitutional incongruity and different developmental objectives were at the root of the split. ACE represents the national education community, the schools, colleges and universities, and started its programme for evaluating civilian employer-based training in 1974 'from the standpoint that higher education is the place where learning takes place in the best way'. It should be said that in 1986 this no longer appeared to be the ACE PONSI position. Over 210 organisations have ACE credit-recommended courses. More than 2,600 courses have been evaluated since 1974.

Americans distinguish between accreditation, licensing and certification. Licensing is the only function of the three which is really governmental. It is largely a matter for individual States rather than for the Federal Government, and licensing arrangements tend to bind public rather than private institutions except in matters like public safety. Only a government agency can license; and it is done for some professions, such as medicine or engineering, but not for others, such as banking. More than one witness referred us to the history of licensing as a means of establishing only a minimum standard operation 'on a knowledge basis, which you can read in a book or learn sitting in a classroom.' Some licensing arrangements were seen to generate demand for credits; but generally neither licensing requirements nor the college credits of the kind recommended by the two agencies reflected competence-based assessments. **Competence is the ability to perform a particular task or job to a prescribed standard. It is the ability to turn skills, attitudes and knowledge into the**

solution of live problems.

By contrast, government is not seen to have had a function in accreditation. 'Accreditation pertains to programme, certification to the person, but both of these are private enterprises. The determination of the status of accreditation or certification is usually done by professional groups or else by regional groups. The Council on Post-Secondary Accreditation is divided into two separate groups. One is the professions -they are accrediting agencies - and the other is the standing regional accreditations, which pertain to colleges and high schools'.

Interviewees offered some perspectives which were sharper than the blandnesses of the official biographies of accrediting agencies. For instance, one of our 'other experts' offered a thumbnail sketch: 'Both programs are very small ... have been in business a long time, have caught on slowly, have not had promotion, have not had parent bodies that really cared much ... they've been stepchildren ... now of late they're getting more attention' in the Press, with articles along the lines of 'Could You Get a Free Education at a Corporation?' In some ways it is surprising that growth has been so slow and that, quantitatively, this form of accreditation remains so extremely marginal to the enormous bulk of formal employer-provided training and so insignificant among the various forms of industry/education collaboration. Even the most sceptical of our 'other expert' witnesses offered us a rank order of public esteem: 'government is bottom, industry is in there somewhere and education is way up.' It was suggested that credit recommendations, like Continuing Education Units (CEUs), serve as proxies because of the vacuum where the comprehensive structure of vocational qualifications should be in the United States. All interviewees agreed on the high status of education in American society. No one thought that the agencies had done much more in twelve years than establish an academic toe-hold in employment-based training.

3.3 Current operations: evaluation and credit recommendation

The heart of the accrediting process is the evaluation of the noncollegiate sponsored courses, which is based on the policies and procedures approved in 1975 by the New York State Board of Regents and the Commission on Educational Credit and Credentials of the American Council on Education. A full description of program policies and procedures taken from College Credit Recommendations is reproduced at Appendix 2. A briefer explanation of the review process, again in the words of the Directory (USNY 1985, p.4) suffices at this point:

'Noncollegiate organizations participate in the National Program on a voluntary basis. Each sponsoring organization selects courses for review with the assistance of the Program staff. Only educational programs or courses conducted on a formal basis and with official approval of the sponsoring organization are considered for review. Informal training or job experience is not reviewed. Courses must present what is thought to be college-level material. Classroom-based courses conducted over an extended period of time should contain at least 30 hours of instruction; those offered on an intensive basis should be at least 35 hours in duration. Such courses must have a prescribed program of instruction and be taught by qualified instructors. All courses must include an appropriate method of evaluating student performance. In the case of correspondence and independent study courses, there must be supervised final examinations administered under secure conditions.

Organizations supply the following information for each course submitted for review:

1 A syllabus describing in detail the objectives, content, and methodology of the course.

2 Instructional materials used (textbooks, audio-visual materials, case studies, etc.)

3 Procedures used for measuring the performance of students in the course and samples of the evaluation procedures.

4 Criteria and procedures by which instructors are selected.

5 Educational background and work experience of the students taking the course.

6 Duration of the course.

Each organization also supplies information on the administration of its education activities, including an explanation of procedures for course development and revision, of procedures for recordkeeping and reporting, and of controls to ensure uniformity of quality and course content when a course is offered at several locations.

Review teams are normally composed of three persons who are selected from college and university faculties and from noncollegiate organizations. They are selected on the basis of their knowledge and experience in the subject area of the courses to be reviewed. Evaluators are suggested by postsecondary institutions, professional and educational associations, and noncollegiate organizations.

Review sessions are usually conducted at the location of the organization offering the courses. Organizational staff members familiar with the courses are available to answer questions that may arise during the review of the course materials. After a thorough review of all the information and materials supplied by the organization, the team members first decide if a course is at the college level. If it is, they then determine the category of credit, the number of credit hours, and the appropriate subject area or areas to recommend. Whenever the team establishes a credit recommendation for a course, it has determined that the method of assessment is adequate to judge that students successfully completing the course have mastered the subject matter. The team members also review each course exhibit (the description of the course that will appear in the Directory) to ensure that it adequately describes the course.

In some cases, the team may evaluate together a group of two or more related courses which individually are too short to be eligible for review. If appropriate, a single credit recommendation is established for the group of courses, and it applies only when a student has completed all of them.

In other cases, the team may recommend that no academic credit be granted. Reasons given for failure to recommend credit have included: (1) the limited scope or highly technical nature of a course compared to college programs; (2) the lack of college-level material in the course; (3) the absence of adequate evaluation of student performance; and (4) failure to present sufficient materials on which to make a judgement about a course. Courses for which credit recommendations are not made are not listed in the Directory.'

In addition to their directories, both programs offer an elaborate and slightly different range of information services to publicise credit recommendations and to provide official records for sponsors, for the employee and for the postsecondary institution considering offering credit to the employee. An example of these services from ACE is its Registry of Credit Recommendations, whose functioning is described by ACE in this way:

'The Registry of Credit Recommendations is a nationwide, automated record-keeping system centralized at the Office on Educational Credit and Credentials for the American Council on Education. The Registry of Credit Recommendations, established in 1978, offers a convenient method to document employee training and education which has been evaluated by the Program on Noncollegiate Sponsored Instruction (PONSI).

The Registry provides each user with a comprehensive transcript previously available only to traditionally enrolled students. The confidentiality of these educational records is carefully maintained with only the employee and the organization which offers the courses having access.

The transcript displays the titles of the courses successfully completed by the individual employee, when and where they were completed, and a description of course content and the PONSI credit recommendations. The transcripts will be sent from the Registry Office of the American Council on Education to institutions, organizations or individuals as requested by the employee.

The Registry of Credit Recommendations, whose operational policies and procedures have been approved by the Commission of the Office on Educational Credit and Credentials, is open to all sponsoring organizations of the Program on Noncollegiate Sponsored Instruction. Educational records may be established by an employee of these sponsoring organizations.

This permanent, computerized record of employees' educational accomplishments relieves organizations of the responsibility of issuing company transcripts and enhances the credit acceptance of the recommendations. The accumulated record of transcript requests provides sponsoring organizations with an ongoing record of the utilization of the credit recommendations by their employees and the rate of credit acceptance by educational institutions. A representative number of companies now use the resources of the Registry of Credit Recommendations with thousands of employee educational records on file.'

A sample transcript of the Registry of Credit Recommendations:

Registry of Credit Recommendations
American Council on Education
One Dupont Circle • Washington, D.C. 20036
(202) 833-4920

VALIDATION NUMBER 01-000-0009

SEND TO
John A. McLaren
Director of Admissions
State College
Northtown, Ct. 11223

SEND AT THE REQUEST OF
Alice Doe
204 Cleveland Street
Chicago, Il 60606

COURSE CODE	DATE COMPLETED	COURSE TITLE AND DESCRIPTION
IB-0008	12/18/83	ECONOMICS INSTITUTE OF BANKING 15 weeks. Basic economic concepts; measurement of national output & income; national income analysis; monetary & fiscal policy; basic demand, supply, and price concepts. LD-3 sh: Economics.
IB-0011	1/29/84	INSTALLMENT CREDIT INSTITUTE OF BANKING 15 weeks. Credit evaluation; techniques of installment lending; leasing of consumer goods; collection; rate structure; legal aspects—installment credit. LD-3 sh: Banking, Business Administration, Finance.
IB-0014	2/18/85	MANAGEMENT OF COMMERCIAL BANK FUNDS INSTITUTE OF BANKING 15 weeks. Emphasizes importance of funds management-coordinating policies on loans, deposits, investment and capital (prereq: Accounting I or Economics). UD-3 sh: Banking, Business Administration, Finance.
		3 EDUCATIONAL ACTIVITIES ON FILE

Users are urged to consult the current issue of *The National Guide to Education Credit for Training Programs*. This publication is available from: Macmillan Publishing Company, Front and Brown Streets, Riverside, N.J. 08370 — (800) 257-8247

Both agencies are well-established. The fees and expenses of evaluation are borne by the organisation whose courses are being evaluated, and that organisation is also required to pay an annual maintenance charge to help defray some of the recurrent costs of the programme. These costs vary according to the number and nature of the courses being evaluated. USNY and ACE have clearly been supportive parents. ACE received help from foundation money initially, but since 1980 it seems to have been self-financing with respect to most direct costs. There was no evidence that costs and financial arrangements were an issue.

However, some interviewees threw considerable light on the actual practice of evaluation and production of credit

recommendations. The criteria and language of evaluation and recommendation are so overwhelmingly academic in both programmes that the recommendations which result can properly be described as recommendations for academic or college credit. It was natural to seek the judgements of those whose training had been evaluated on the accuracy of the credit recommendations in representing the competences produced by training (validity), on their consistency in representing these competences (reliability), and on the information gains or losses from the process of redescribing employer training in terms of a credit-based system of higher education with objectives and a culture different from those found in employment-based training.

The professional staff of the accrediting agencies were acutely aware of all the familiar problems of this kind of evaluation. 'The evaluation process ... is a very subjective one, is a matter of faculty members with expertise in one of the areas making a judgement based on their knowledge and the way they teach a particular course ... The three people who provide the team have to reach a consensus, and in the translation process ... we are using those credit categories we have ... we are telling them to focus primarily on content and its complexities and comparabilities. We tell them less and less, as we try to get them to think about outcome, [we tell them] not to consider length ... length almost becomes obsolete ...' Is a PONSI description of an employer's management course, and its credit-rating, likely to be an accurate representation of the course's competence objectives? Management training is a suitable test case. Some elements of management training, for instance systems analysis, are easy to describe quite accurately in terms of academic activity and language. But much that the manager needs to perform well - skills in personal relations, communication, leadership, openness to learn and so on - may not have convincing academic analogues and cannot be satisfactorily described in the language of academia, the language of disciplines and fields of knowledge. The accrediting agency is well aware of this and that the company sets up its training to make people competent, not to help them earn a degree. The agency examines the training course only for what is comparable. It 'sieves through it and tries to come up with comparability to something that might be taught on a college campus.' It is not pronouncing on overall equivalence to a college course. In evaluating a company course of one hundred hours and deciding that some components compare to forty-five contact hours in a college associate degree programme it is being extremely selective and ignoring everything for which there is no college comparator. For instance, the New York State Police Academy has a Penal Law Course with sixty hours of classroom instruction and a tight requirement of 75 as a graduating average. College

graduates, sometimes even with a Masters, come into the Academy (minimum recruitment age is twenty-one) who have never failed a course, C average, which is in the 70-79 range. But that performance will not be good enough unless he can achieve 75 or over. USNY PONSI evaluators are thought to operate on a benchmark of one hour of college credit (one semester credit hour) per fifteen hours of classroom work. A Bachelor's degree commonly requires a total of 120 credit hours. Yet the Penal Law Course is only recommended for three credits in Criminal Law in the lower division baccalaureate/associate degree category, implying forty-five classroom hours. This was how the Academy saw it, and it simply accepted the judgement, 'we really don't have a dialogue, I guess.' But the judgement of the review team is a more complicated process than can be comprehended by any arithmetic ratio between class contact and credit hours. As the accrediting agency sees it, 'not every bit of quality training is going to be able to be translated into our own terms.' As one of the accredited employers put it (and was echoed by two more), 'ACE is only looking at our program as it relates to college courses and is not interested in a course if it is too much of a training course.' The New York State Police Academy has in-service continuing training programmes which are not credit-recommended because there is no academic equivalent. They are good courses, but they are 'nutsy-boltsy'. Academy trainers believe that the non-credit recommended courses are as educational as the credit recommended courses in the initial training programme in the sense that they enhance the learning capacities of officers just as much.

The practice of evaluation in both agencies is certainly more flexible than surface inspection of evaluative guidelines might suggest. In the case of management courses, it was pointed out that there is a great variety of opinion within the academic system as to what components should be included, so there are a good many potential academic analogues available. Moreover, the agencies rely on the expertise of the teams to decide what is or is not appropriate in, say, a middle management programme.

How can judgements of level and standard be kept consistent horizontally (between evaluation teams spread across a continent at one time) and vertically (between different teams evaluating similar programmes over periods of time)? The issue is not important in the sense that admitting institutions make up their own minds about whether to accept credit recommendations or not, whether to award less than recommended, as recommended or even, conceivably, more than recommended. As one accredited employer put it: 'It's like any transfer credit ... you could take courses at Harvard and another university would not accept them for whatever reason.

Everyone has their own transfer policy.' Accredited organisations could cite cases of rejection of recommendations (because courses do not fit a college's degree programme), acceptance at a lower rate, and straight acceptance - for example, credit for American Institute of Bankers courses being transferred into area colleges, mainly entry level programmes for associate degrees, at the level recommended. However, reliability is of some importance if accreditation of employer-provided training is seen as a way of lowering information costs. The less reliable the evaluations, the less successful the agencies are in lowering the information costs faced by admitting institutions and anyone else looking at an employee's education and training record.

At first, both agencies were engaged on something of an exploration project, in which they were working out how to determine academic standards in non-academic settings. As experience accumulated 'more standardisation was built in just from a knowledge of what had gone before ... let us see what a previous team determined and see what the comparability is'. Although the evaluators used by ACE and USNY come from a very wide range of institutions and locations the variance between team members is in general quite small, rarely as much as one semester credit hour between any of them. There is very little variance between the judgement of academics and non-academics - USNY includes at least one non-academic in a team, whereas ACE composes its teams entirely from academics. ACE generally draws its teams from one geographical area. The same team does not generally travel wherever is necessary in order to evaluate all the training which is within the competence of the team, although ACE does try to use its evaluators again when they are very good. More often, however, people are evaluating for ACE for the first time. Outside the collegial norming pressures of the academic community, the main source of standardisation is the officer working with the team. However, the officer is not a formal member of the team, is unlikely to have subject expertise to disagree with evaluators and her influence 'is on the process of evaluation, not content.' Therefore the officer might draw to a team's attention features of the training course under consideration, for example documentation gaps or testing deficiencies, but would never attempt any persuasion as to credit recommendations.

What Appendix 2 says about procedures for evaluating institutional approaches other than face-to-face teaching in classroom, laboratory or workshop is sparse. But the practice of the agencies suggests that they are not as rigid in their adherence to the contact hour measure, converted into semester hour credits, as might be thought. If there is a very high quality programme of noncollegiate instruction

delivered by methods other than face-to-face (e.g. CAL or correspondence) with no traditional contact hours worth mentioning, the review team has the freedom to be flexible and take particular account of outcomes. The evaluative process as described does indeed look to be heavily process-oriented rather than outcome-oriented. The newer learning technologies are often attractive to employers. As they become more heavily used, and standardised time inputs based on lock-step instructional systems become rarer, the evaluative focus is bound to concentrate more on attainments, on mastery of bodies of academic knowledge and of skills.

That is a trend in instructional methods to which the accrediting agencies are bound to adapt as best they can, using contact hour equivalents to reach semester hour credits. But the whole process is going to stay within the framework of academic criteria because it is borne out of initiatives from the education establishment and aims to make employer-provided training transparent to academics. 'Duration and concentration of effort in relation to the generally accepted practice for determining credit in postsecondary institutions' remains a key evaluative criterion (see Appendix 2, 10c). Contact hours have always been a very unsatisfactory evaluative starting point because they stand proxy for the speed at which something is learned. That speed is highly variable, depending on the individual and on the learning technology. The accrediting agencies know their business. They know that they are trying to translate only what can be translated from one learning environment, the noncollegiate organisation, into the structures, criteria and language of a sometimes very different learning environment, the college. So they rely very heavily on the judgement, expertise and flexibility of the review team; and they include in guidelines to evaluative criteria some very wise caveats which emphasise the chasm which can exist between the noncollegiate and the collegiate learning environment: 'Credit recommendations made by reviewers shall not, however, be derived by simple arithmetic conversion. Intensive courses offered by noncollegiate organisations do not necessarily require as much outside preparation as many regular college courses. Reviewers should consider the factors of pre- and post-course assignments, prior work-related experience, the concentrated nature of the learning experience, and the reinforcement of the course material gained in the subsequent work setting' (Appendix 2, 10c).

The accrediting agencies recommend college credit. They do not even attempt to evaluate employer training programmes in the employer's own terms, i.e. as a means of accelerating and managing employee learning to improve the individual's job competence, the better to achieve corporate goals such as

productivity, profit and competitiveness. One employers' association, the American Bankers Association, recognised this very clearly by submitting for evaluation only those courses which were directly analogous to what is available in postsecondary academic institutions. Training and information programmes focussed more exclusively on job competence and the industry's non-academic concerns were being accredited through the industry's own accreditation system running on the criteria appropriate to employer training. In effect there was a dual system of college accreditation and industry accreditation. As to consistency of evaluation over geographical space and over time, that is difficult to achieve. It is the more difficult if, in addition, reviewers have to disentangle the comparable from the non-comparable and these elements are mixed in different proportions from one course to another. On the other hand, problems of consistency exist quite separately from this accreditation activity in any very large system of postsecondary education comprising a host of institutions with varying standards. It would be unreasonable to expect the agencies to do much better than the system from which they draw all or most of their reviewers and into which they are providing information.

3.4 Motivations

As the agencies see it ...

The accrediting agencies have their own motivations. In the case of the New York Regents, they established the National Program on Noncollegiate Sponsored Instruction in 1974 (with the American Council on Education) 'as part of their commitment to increasing access to higher education, to keeping the quality of educational resources high, and to ensuring that all educational resources are utilized in the most effective way possible' (Murdick and Grover, p.1).

Why to do employers and employers' associations seek credit recommendations for their courses, and, by extension, for employees? The experience of the agencies suggests a variety of motivations, more than one of which is often in play:

1 One company training department wishes to be seen to be a step ahead of others, but repute with the public (consumers) and with possible recruits can rank as high as repute with other companies.

2 Employers' associations may be 'looking for the prestige of having approval from a national organisation that's representative of higher education.' Some associations regard accreditation as 'a seal of approval in a competitive environment.' Some trade associations see

accreditation as helping a movement towards professionalisation, and as a road towards nationwide recognition of standards, since the state-wide standards incorporated in licensing are too variable to provide such a benchmark.

3 Through frank and objective review by outside experts, accreditation may help to lift **work standards, meaning agreed and recognised competence levels required to perform a job**, as well as the quality of the training programme under review.

4 The morale of an organisation's training staff is boosted.

5 Use of credit recommendations by employees at educational institutions reduces the cost to the organisation of tuition reimbursement.

6 This can be regarded as part of the social overhead of business. 'We rely very heavily in the United States on the social conscience of the businessman, and so far, so good' to pay for course evaluations, tuition fees and so forth. But the agencies are well aware of the strict limits on how much they can expect to leverage on the social conscience of industry, so most of the motives they ascribe to organisations seeking credit recommendations are non-altruistic.

7 Employee satisfaction and motivation to train may be increased when training counts towards the higher social status of a degree and the improved chances of advancement associated with it.

The view of the agencies about the benefits to noncollegiate organisations is very clear. In addition to positive effects on the organisation and its training, employees who take credit-recommended courses can benefit directly, and organisations will see that 'by serving their employees they also serve themselves' (Murdick and Grover, p.4).

As the accredited see it ...

There are some special features of employers' associations or trade associations which justify considering them separately from individual employers whose training is accredited. Most obviously, their perspective tends to be the industry, trade or occupation rather than company operations. They are concerned about a myriad of training courses scattered all over the United States some of which need attention. They need 'to do something about ... programmes which are not accredited and are rather loosely run.' The American Bankers

Association, for example, has as its educational arm the American Institute of Banking. AIB claims that it is the largest industry-sponsored adult education programme in the world. Approximate annual class enrolment is over 250,000, with another 100,000 participating in shorter programmes and seminars, 15,000 volunteer bankers operating the programmes and 4,000 instructors teaching them. Its programs are delivered by over 400 autonomous chapters and 200 study groups nationwide. AIB runs courses in many hundreds of locations and develops curricula, textbooks and testing to serve ABA members, who comprise 90 per cent of the country's 14,500 commercial banks. A few AIB chapters run courses in conjunction with local community colleges and academic credit is awarded that way. But most do not. AIB also runs intensive one or two week summer programmes at universities, known as banking schools. Both the chapter programmes and the banking schools are addressing 'the issue of quality which is tied in with accreditation or recognition.' It was the concern for quality assurance which led the bankers to decide to submit programmes to peer review through ACE and have them credit-recommended. 'The big banks are going along with this. They do not see it as affecting them too much. It's mostly the small community banks that see this as a big plus for them ...' The basic principles are clear - and the banking view is said to be very much the same as the view of the Council on Postsecondary Accreditation - namely, that it is not a governmental role to tell each profession what it should do nor is it the job of any outside agency, but 'it is up to the members of the profession to police themselves, to establish the standards which they want, to govern themselves.'

In the United States it is still possible to progress right up to Chief Executive Officer in a bank without ever having been recognised as a fully qualified member of a banking profession. There are a declining but still significant number of bank CEOs who do not have a college degree either, though the march of the MBAs and PhDs is evident in banking as elsewhere in trade and industry. American banking is in a fairly early phase of the professionalisation process, and training accreditation of at least two kinds has an important role to play.

Some occupational groups - which would perhaps prefer to be professions - seem to be increasingly conscious of the need for quality assurance in training. They are influenced by the more extensive and longer-established licensing and accreditation practices to be found in medicine, law and some other professions. Everyone admits that the mainstream tradition of American business is that employers are rather uninterested in bits of paper compared with the way a person does a job, rating performance well above qualification. On

the other hand, there are long-term trends ... 'it is the route that medicine went ... at the turn of the century here in the United States you could run round the country being a medical doctor after six months of training ... then you had the establishment of an accreditation process, longer formalised study and government in a stronger licensing mood.'

In banking, the drive for credit recommendation, and for industry accreditation, seems to come not from bank employees but from the trade association. At grassroots level, the level of an AIB chapter, there may be a trend for employees to care more about credit. 'There is more and more interest in matriculating for a degree programme at a two year or a four year area college.' But overall it is a trend from a low base. Credit accumulation - **arrangements enabling candidates to accumulate a specified number of credits in order to qualify for an award, and to do so on an intermittent basis or in different learning environments** - is a vision of educationists rather than most employees. Even when AIB courses are recommended for credit and this is well advertised, 'very few bankers seek to get college credit.' The employers want 'a nationwide system of quality banker education.'

Banking is interesting because in AIB practice the relationship between accreditation and experiential learning is more clearly discernible than is often the case, and accreditation fits within a comprehensive strategy for developing and upgrading banking education and training. **By experiential learning is meant learning by doing rather than through formal instruction or even through self-study.** Recognition of experiential learning has been tackled indirectly. For instance, there are four main levels in banker training, and for entry to a second level course certain prerequisite courses are specified. However, if someone has not taken those courses, there is an alternative which may attest to appropriate experiential learning. A person can 'test out', i.e. take a challenge examination to show that he or she has the prerequisite knowledge and skills, hitherto uncertificated. An alternative, and slightly less certain form of recognition of experiential learning, occurs on senior management programmes when ABA invariably requires that participants be in senior level positions. As in the United Kingdom, there is a trend in practice to recognise the value of experiential learning by prescribing periods of time (experience on the job) and levels of authority (responsibility exercised) as necessary components in the developmental stages of a banker, and making this experiential learning a prerequisite for entry into quality-assured advanced courses.

Assurance of the quality of the courses is necessary to distinguish the offerings of fly-by-night entrepreneurs from the good programmes which will reliably develop the skills which bankers learn on the job. Increasing attention is being given to the developmental paths in banking and how these should be designated, including appropriate recognition for types of learning as different as learning recognised in formal academic qualification and that which derives from work experience. At grassroots, among the local AIB chapters, there may be more variation of opinion than at headquarters in Washington, some chapters, for instance, believing that PONSI accreditation is a wise move, some that it is a waste of money and others being undecided.

Each trade association has a somewhat different rationale, despite strong common elements. The realtors, for example, deal with the property-owning classes. To have a college degree, not necessarily in real estate, would probably be an advantage in dealing with clients who may well be more educated than they are. But realtors, like bankers, are also concerned about the quality of services and of the training needed to underwrite that quality. A trade association like the National Aseociation of Realtors does not begin the process of raising training quality with very big firms, operating across the nation, which cover all course costs for employees, any more than ABA tackles the megabanks. Instead it begins with its own courses and those of its specialist affiliates, where course fees are almost invariably paid by employees themselves. NAR itself paid for the first PONSI evaluations, even where the courses were those of its affiliates. Again, the drive towards accreditation comes from the national association. But again, accreditation is only a small part of a widespread and multi-faceted concern to achieve better vocational education and training. In California, the State Association worked with the California State system to develop a real estate degree. In Washington DC, the National Association is developing a real estate degree with the American Open University, which is the distance learning arm of the New York Institute of Technology. Realtors are nowhere near approving college real estate degrees in the way a professional institution might approve a professional degree. Where it is found at all, the real estate degree seems to be relatively new on the college campus. Seeking credit recommendation for association courses is simply an additional tactic, but not expensive 'for what we are getting back.' What is that? There is no evidence from firms or the business as a whole to suggest that quit rates will be affected. But there may be other benefits. 'We are getting people who are gaining an interest to go back to college because they feel that they do not have to start with credit one ... we are getting a lot of people who started college and never finished. We are getting

people, especially housewives, who might have moved around with their husbands, and they have seventy-five credits and the new college will not accept any of these credits. Not only will American Open University, because it is more flexible, accept credits as long as they match the course description and the college is accredited ... but with these additional [credit-recommended] courses they are way ahead of the game. We are gaining professionalism and we are gaining people who want a college degree, which is something we like to see happen.'

One interviewee stated the professionalisation rationale for accreditation quite baldly when he said that 'professionalism is equated to degree holding.' The more an occupation recruits people with degrees, and the more people are trained on courses which are recommended for college credit, the more will that occupation be regarded as a professional group. Credit-recommended employer-provided courses - degree level training - are regarded as a way of attracting better quality recruits into an occupation like policing '... in America we are so education-oriented. That degree is so important. People are aware of the importance of that degree to other people, maybe not always to themselves ... It's a standard. Whenever anybody goes any place looking for any type of employment, usually the first question is "what is the level of your education?" And by that they mean what degree do you have?' The standard observation about American employers preferring performance to qualification was quickly countered: 'Yes, but now, to get a foot in the door, people need to have some sort of a degree. It's a result of increasing competition in the labour market.' New York State Police recruits at age twenty-one and and above. It offers 'a job that pays quite well, is held in reasonable esteem in the community in general, give you some outstanding training and - as a side benefit - you will pick up almost one year of college work, four year programme, i.e. twenty-nine hours of college credit. Not only that, we pay you while you are doing it.'

Some of the employers whose training is accredited are in industries where licensing is important or where there are well developed forms of industry accreditation of training. For example, the training in a firm like Ebasco Services Incorporated, which sells design, construction and maintenance services into the nuclear industry, is influenced both by the industry's self-regulation of standards and by state licensing. Of course, the firm's training is driven primarily by its corporate needs; but it is not unhappy, by and large, that it is also driven by INPO standards. The Institute of Nuclear Power Organizations (INPO) is a grouping of all utilities building and running nuclear power plants. It acts as a buffer between seventy or so utilities and the

Federal Government's Nuclear Regulatory Commission. In British terminology, it is a non-statutory training organisation, funded by the operators, with an evaluating agency which generates its own training standards. Three Mile Island did what it was supposed to do (closed down); but it also gave the American people a shake. Among other things, it raised the training issue sharply and strongly. Before NRC could step in, INPO decided to 'get the training act cleaned up' by raising training standards for all workers in plant. For example, INPO insisted on the presence in plant and twenty four hours a day of a graduate engineer with nuclear experience.

The impact of INPO's training mission on training requirements and standards in a firm like Ebasco appears to be profound and widespread. Ebasco is an international engineering and consultancy firm, with over 6,000 employees, which has catered for clients in sixty countries. It is not a utility. But it has to respect utility standards and practices, and therefore INPO training specifications. It sells its services into an industry with powerful industry accreditation of training. INPO inspects its member utilities, both by invitation and without warning. INPO might accredit, for example, a Reactor Physics course in XYZ Power and Light. If an employee moves from there to ABC Power and Light after taking Reactor Physics, then ABC Power and Light will accept the INPO-accredited Reactor Physics. It can be sure that the course has met the industry's basic standard. At present, INPO itself does not provide training. It only accredits. So there is no possible conflict of interest, as there sometimes is when accreditator and provider are one. INPO is really run by people with operational expertise, not by academics. Effectively, INPO's training accreditation is a vocational qualification process based on an industry criterion of competence and intended to provide assurance as to job competence. It is not college-driven.

Why then does a firm like Ebasco also have courses evaluated for college credit by USNY PONSI? The answer seems to be a mixture of external verification of quality and some help to staff who have to be licensed or relicensed. INPO will not formally accredit the training of anyone but a club member. Much civil engineering work is funded by the Federal Government or by a State Government, and for such work the engineer needs a PE - needs to be licensed as a Professional Engineer. Indeed, the President of Ebasco, by corporate charter, must be a PE (compare a bank). Chief engineers must be PEs. The influence of these professional standards is very strong inside any engineering firm, even though licensing standards vary somewhat between States and one State's licence is not automatically good currency in

another. The States are increasingly saying that PEs are not for life. They have to be renewed, and for renewal the engineer must be able to show 'some college training.' College credit for employer-provided training may serve this purpose. USNY PONSI can give a nationwide assurance of quality.

The continuing education requirement in licensing applies in insurance as well. Brokers need college credit for their licences, and insurance is regulated -differently - by all the States. There is a close working relationship between the National Association of Insurance Commissioners - an association of the Commissioners from the fifty States - and the 1800 insurance companies. The Commissioners meet four times a year and have a week long convention, and the insurance companies turn up in force. If the Commissioners feel the need to redefine, say, the way people accept cargo bills of lading from the United Kingdom, they might appoint a task force (volunteers from the companies), which reports in due course. The Commissioners then accept or do not accept the report, act or do not act upon it. So there is something like an industry-wide body concerned with insurance practice. But there is not an industry-wide accreditation system.

If, like Marsh and McLennan Incorporated, you are an insurance broker, international as well as American, but operating in that industry, its regulatory practices are bound to influence your training. Unlike the nuclear industry, there did not appear to be an industry-wide movement towards an accreditation system centred on a production competence standard. There are, of course, appropriate vocational qualifications (see CPCU/IIA, 1984a and 1984b) whose component courses may be credit recommended. So the situation is that some States have continuing education requirements for maintenance of licences, and that the amount of credit granted for successful completion of professional examinations varies for each State. If the professional courses are also ACE PONSI credit recommended, then the credit actually received depends on the State in the case of licensing and on the college where credit is being used to count towards an academic qualification. In the case of Marsh and McLennan's own Professional Development Program (Marsh and McLennan, 1986) most courses are eligible for continuing education credits in those states whose licensing requires them, and certain courses are also approved for college credit at the graduate level. Professional insurance qualifications are obviously highly regarded. The industry is in three parts: underwriters, brokers and insurers. If a broker comes into a brokerage or an underwriter into an insurance company the firms can easily judge how good that broker or underwriter is. But if a client - an insurer - wants, say, a risk manager to look after his insurance, the

client's business is not insurance and he needs some guarantee that the person he is hiring knows the business.

A degree is a bonus ... 'this is a degree-crazy country.' It is recognised that helping employees towards a degree might conceivably increase the quit rate among some of the most able and motivated employees. But firms seem to be quite relaxed about this possibility because they do not see it as quantitatively significant enough to worry about, and they believe that the doors opening for a new graduate are as likely to be in the firm as outside it. Some people might be attracted to a firm with a high quality, credit recommended training programme. Such a programme also tends to raise the prestige of the training department in the eyes of the firm's own management and in the business community.

For other firms, licensing requirements do not figure among the several reasons for seeking accreditation. Why, for instance, does a firm like Xerox, with a formidable international reputation as a trainer, bother with college credit? Actually, Xerox arrangements are biased towards degrees as such. Its extensive tuition aid program is there to benefit both the firm and the individual. It can help an employee get a degree, complete a degree or add another. A degree constitutes a very definite objective and many Americans want one. We found one or two companies where this seemed not to be the case; but there is a good deal of evidence supporting the view that many corporate tuition aid programs 'are predicated on the attainment of another degree.' Firms seem to do this for a number of reasons, one being 'to see whether the student is serious or whether the student is just playing with further education.' Some corporate trainers want to reduce the degree orientation within their firm's tuition aid programme, in the belief that the firm should at least in part support the employee on any job-related course that would benefit the employee, whether or not it counts towards a degree. Xerox will pay for individual accredited courses, but not at the magnitude it pays for degrees. An employee can take courses counting towards a degree and be reimbursed two thirds of tuition costs. However, if the employee goes on to get a degree Xerox reimburses the remaining one third of tuition for all courses taken towards the degree since joining Xerox. Other firms have similar arrangements. It is well known that the rate of take up on tuition aid programmes is astonishingly low on average. Nevertheless, the structure of such schemes is revealing of corporate preferences.

Xerox and firms like it recognise the motivations of employees. In many specialisms an appropriate degree is important. This is true for training where ... 'to be recognised as a truly professional person you have to be

successful in your business career as an educator but also to have the academic background.' Within a company it is often as true as ever that competence on the job and not paper qualification is what counts. But once people start to move about - in a notably restless country - then a degree can be useful, necessary even.

So it is academics who visit Xerox to evaluate and accredit some of its training. Reputable academia is manning the battlements and controlling accreditation carefully. It is protecting itself from so-called "open universities" which offer soft (unaccredited) PhDs based on a reputable Masters plus business experience. There are unaccredited academic institutions which bring the mixing of academic learning and work learning into disrepute. 'The academic community is trying to protect its territory against these fly-by-nights - Get your PhD in Six Months. This has queered the pitch.' The result of the respectable academic evaluation by ACE PONSI is a respectable college credit recommendation which any employee without a degree might be glad to have.

In another firm, the trainers were not starry-eyed about academics, particularly about their methods of teaching adults ... 'colleges practice pedagogy [not a compliment] ... and all that crap which you have to take from professors.' Nevertheless, they 'take a lot of pride in knowing that courses they have developed have passed ACE muster and have been reviewed by fellows who have a university orientation ... we think that helps to create a standard or to promote a standard.' This apparent ambivalence was quite common. One company, Chesapeake and Potomac Telephone, had designed and provided graduate marketing courses. The accrediting agency sent its review team drawn from university disciplines, and they reviewed the course in stringent fashion. The firm, which is a marketing organisation on a far larger scale than any of the reviewers' universities, did not argue with them. The company knows what it is buying. It runs the course for operational reasons. It also seeks accreditation for college credit which is worthwhile, as far as it goes. There is a place for such accreditation, but it is not central. 'The company is not really interested in credentials. It is interested in skill and knowledge. Traditionally, we do not give people promotion on the basis of their degree.'

Most firms whose training is accredited share to a greater or less degree a concern to have a better qualified and better motivated workforce, and accreditation is seen to contribute to this goal. It is sought for business advantage. A firm like McGraw-Hill in New York has upwards of seventy-five courses which might be evaluated; but it has had less than a quarter of those reviewed and credit-recommended. The

criterion is what is best for the firm.

As others see it ...

For the most part the experts who are detached from the accreditation process confirmed the views from the agencies and of the accredited firms as to motivations. Corporations seek accreditation 'to satisfy their employees because their employees are conscious of the advantages of academic training in this country ... sometimes if they get the AB degree it will involve some promotion or some salary increment, but also they will feel better with it because we are a sort of credentialled society ...' As another interviewee put it, the ageing baby boomers means that people are increasingly stuck: too many people can perform on the job and a degree still helps you to differentiate yourself from other people. At the same time, the important point is made - with regard to big, high tech companies - that credit recommendation programmes 'are dependent on the initiatives of the corporations. The corporation does it to please an employee. But the corporation is also concerned about some evidence of quality in its own classroom ... it wants this accrediting association to come in and say this work is of calibre for the first two years, the second two years or postgraduate work ... the corporations are extremely concerned about the quality of their classroom work.' Corporations are certainly teaching 'for productivity improvement, for the bottom line; but it is also much broader. It includes increasing overlap with college and university courses ... increasingly using new delivery systems which enable them to have an even broader curriculum at a cheaper cost, and sometimes at higher quality.'

The same explanations recurred again and again. 'Our society is very degree and certificate conscious ... individual workers want to get training, want to get a degree or a certificate ... it just adds legitimacy, it has a symbolic quality.'

The legitimacy which college credit offers is thought to be more important to individuals as a motivator than any belief that the training so accredited will have greater dollar value on the external labour market. It is like getting a doctorate - it does not necessarily matter where it is from as long as you have it - 'it opens doors, it provides status.' Employers recognise the attitude and take advantage of it wherever it is particularly hard for them to recruit or keep workers. For example, high tech firms competing fiercely against each other for scientists and engineers in California find it necessary to include in their benefit packages good and attractive training programmes, especially with features

which are not all intensely job specific.

No one knew of any serious study of the relationship between 'enlightened corporate policies on tuition aid, accreditation etc on the one hand, and corporate productivity and profits on the other.' Nor did anyone expect to find such a study since there are 'so many other and vastly more powerful intervening variables which make it too difficult to demonstrate cause and effect.'

So the few companies who do have courses accredited rationalise the decision in terms of business advantage; but it is an act of faith. Some of our expert observers saw it as an act of public relations. 'They do it in the same way they get down and cut ribbons.' Having said that, the same observer freely admitted that there are circumstances in which this form of accreditation is important beyond public relations. Scientists, engineers, indeed senior professionals in any occupation may need to be mobile across industries or regions. If you belong to a regulated or accredited profession, it is good to be able to accredit your employment-based training in some way. Generally, but not always, the profession and not the higher education system handles this. He gave an example from a large manufacturing company. It concerns an initiative which is not accreditation, but one which displays the same corporate motivation as is often at work in seeking accreditation of corporate training. In this company two in five of its engineers had no college degree. But they are engineers and are paid as engineers. They become engineers at work. 'At a certain point, being give credit and status for that becomes important psychic income.' The company paid a few hundred million dollars to a university so that these non-graduate engineers could go to school at night. When it is over 'they will have an engineering degree and they will all feel good ... what this is, is a benefit to the employee. I suspect that there will be some real learning that will leverage product to the earnings side of this company, but that is not why they are doing it. They do not suppose that the return on money is really going to be very high ... what they want to do is to raise their status.'

3.5 Outlook : Uncertain

Despite all the reasons for employers to seek accreditation, the prospects for its extension, and particularly its extension to cover any really significant fraction of employer-provided training, are at best uncertain. Why is this?

The business context of accreditation

One place to seek an answer is in the business context of accreditation, the detailed experience of accredited firms. Some employers have courses accredited throughout the range of levels at which their training operates. A big communications company like McGraw-Hill is naturally biased towards education and provides a very extensive range of courses, some remedial ones, some for disadvantaged and unemployed adults, others on-the-job skill refresher courses and others for career development. The President addresses 'Fellow McGraw-Hillites: "Chance favours only the mind that is prepared" said Louis Pasteur. Perhaps that's why successful people are those who never stop learning - who don't consider their education ended once they've left school' (McGraw-Hill, 1986, Preface). Sixteen of the 1986 Evening courses were recommended for college credit, and not surprisingly credit-recommended courses are clustered largely among the courses on business skills, management, and languages rather than the courses to help employees combat illiteracy in the community, teach nutrition, help your child succeed in school, enjoy and understand Remembrance of Things Past, learn cardio-pulmonary resuscitation or discover the major museums of New York. The college credit recommendation is always clearly indicated and the company maintains a transcript for its employee students, including USNY PONSI credit recommendations, and can list educational institutions which have accepted McGraw-Hill credit. Its courses in the Continuing Education Program 'fall under the same guidelines as those courses which are taken outside of McGraw-Hill and are eligible under terms of the McGraw-Hill tuition refund plan.' Senior Citizens are welcome too. They 'may register for courses of their choosing at no tuition cost. We hope that you will take advantage of this additional employee benefit.' The company points out to its employees that 'these courses also save you money because tuition for similar courses outside of McGraw-Hill is substantially higher.' This is a material consideration for those who fail to attend or drop out of a course, since no refund is payable to them. But the company reimburses tuition in full to those who pass a course, whether it is internal or external. The colleges might seem to lose income this way, but the counter view is that though the colleges may lose the fee on, say, a three credit course, they may soon earn the fees for the great bulk of a two or four year degree. Employee take-up of tuition reimbursement for external courses marched fairly well in step with that for internal training courses. McGraw-Hill had had USNY PONSI accreditation of courses for more than ten years and that experience suggests that credit recommendation does increase demand for on-campus learning.

In a rather different branch of the communications industry is the Chesapeake and Potomac Telephone Company, one of Bell Atlantic's three companies. A later entrant to the business of credit recommendations, thirty five of its internal training courses had already been accredited, some at sub-degree level in programming and skills training, but also some at undergraduate level, and none yet at masters level. All CPTC's off-the-job, voluntary participation, company-sponsored courses had been developed against an entirely different background from McGraw-Hill. In the American trades union movement education and training benefits historically lagged in priority behind most others, for example wages or medical benefits. Then, in the recession at the start of the eighties, some of the biggest unions - such as United Automobile Workers with General Motors - began to bargain hard for education and retraining benefits. They secured some notable agreements with employers and began to raise the industrial relations profile of education and training generally.

In 1969 CPTC had only about fifty people on its Continuing Education programme, as against something like 3,000 out of 32,000 employees in 1985. In 1969 its tuition assistance programme was almost moribund, confined largely to managers and those sponsored by them. Today well over a thousand employees attend colleges with tuition assistance, and there are several thousand more enrolments in print-based home study programmes, mostly slanted to technical and business subjects packaged into off-the-shelf modules. Remedial courses are taught, others in fundamental skills, and more which build on those skills. Some courses are taught in employee time, at no cost to them, but face-to-face by outside faculty on CPTC premises. Often generic skills are taught, and these may be a good indicator of potential for further training. No supervisor approval is needed. If the employee quits, there is no indication on his or her record; only if she succeeds. There is no risk in trying a course.

The springs of the prolonged overhaul and expansion of CPTC's training and tuition aid programme go back to the 1970s. In the early seventies the Bell system was hit hard by federal affirmative action programmes. It was a non-complying employer, with an enormous number of women employees, almost all of whose bosses were men.

A new programme had to be put in place, the point of which was to get women and minority persons moved up the promotion ladder. In order to do that, these people needed to be able to pass company qualification tests for promotion. So there came together the expansion of in-company programmes in the seventies, the new impetus towards education and retraining of the early eighties and the continuing technical training

requirements arising out of the technology of the industry and the changing business and marketing environment after deregulation. Credit recommendation fits into this scenario as an additional employee motivator and an indicator of the training department's quality, but it is the technical imperatives of the business and of the regulatory and industrial relations environment which provide the primary drives of the company's continuing education effort.

Xerox Corporation straddles some of McGraw-Hill's sector - education, publishing - but relies heavily on hardware: copiers/duplicators, information processing, reprographics and medical diagnostics. It has training facilities and programmes in many countries, and in Leesburg, Virginia, an International Center for Training and Management Development. At Leesburg, which is mostly management training programmes to develop effectiveness on-the-job, Xerox has so far had a handful of courses accredited. These ACE PONSI credit recommendations range from three credit hours at undergraduate level to one case of six graduate credits - towards an MBA. An MBA would generally be around sixty graduate credit hours. The course which might be accepted as equivalent to one tenth of an MBA is a very intensive one whose contact time is a two week residential seminar taught by five or six Harvard professors. Another two week management programme is recommended for three graduate or six undergraduate credits. That same course is taught in Britain but can offer no credit 'because there is no one to give it.'

Generally, credit seems to become more popular as you go down the course levels towards introductory courses at associate degree level, especially people moving from an administrative or clerical capacity to a professional one. 'These people really want credits because they are in the process of earning a baccalaureate degree somewhere.' For the most part, Xerox finds that, when it confirms successful completion of a credit recommended course to the college, the employee gets the recommended credit. But in programmes like those at Leesburg not much advantage has been taken of the availability of credit, perhaps in part because so many of the hundreds and hundreds a year who pass through already have degrees.

Xerox training is famous in its own right. The desire for credit, where it does exist, seems to be fueled by the employee's desire for a degree and the company's desire to help that employee. The employee desire for a degree is partly to do with promotion in the company, and it is partly social. There are positions within the company which do not actually require a degree, but some managers may nevertheless prefer someone with a degree, regardless of the

specialisation. The social reason is simply the aspiration to be a graduate. Then, at management level, some people start thinking about MBAs. Most often these MBAs are done with one university. Sometimes that university will and sometimes it will not accept an ACE PONSI recommendation. The MBAs most likely to accept some ACE credit may be most common on the West Coast, whose culture is not the same as the more conservative East Coast. On the West Coast people are 'very, very interested in degrees' and universities tend to be more open minded and open handed about granting some credit for in-company training.

In all three companies, McGraw-Hill, Chesapeake and Potomac Telephone and Xerox, accreditation is a tiny facet of a very large training enterprise whose rationale and shape is explained by other factors. Employer or trade associations are a slightly different case. With over 700,000 members, the National Association of Realtors may be the largest trade association in the United States. But many firms are very small and many employees undertrained. Educational requirements to practice real estate are extremely variable. 'In some States you don't even need a high school diploma; in other States you need two years of college.' NAR affiliated with the New York Institute of Technology, and through its Distance Learning Division, the American Open University, NAR offers realtors right across the country opportunities to obtain an accredited college degree, equivalent to a four year full-time degree. 'We had to make it look good to realtors, and one of the ways of doing this was having courses run by our affiliates ... as well as whatever courses were offered through NAR itself, evaluated by the American Council on Education and credit recommendations made.' So the NAR's major drive to raise the educational quality of realtors runs along two related routes, the NYIT credits towards an NYIT degree and ACE PONSI credits, already available for some fifty eight courses provided by NAR, its affiliates, by State associations or by realtors, the businesses themselves. In addition, NAR is prepared to lobby the State licensing authorities on educational requirements. Around thirty three of the States require some number of college courses to get a broker's licence [as distinct from a sales person's licence]. Starting from 1 January 1987, one of the designations, from one NAR affiliate, required a bachelor's degree.

In a different association, the bankers, the role of accreditation of employer training is slightly different. Among the realtors, courses run by specialist affiliated associations and by State associations figured largely among courses being accredited by ACE PONSI or USNY PONSI. For example, USNY PONSI recommends credit for four courses run by New York State Association of Realtors, Inc, all in the lower

division baccalaureate/associate degree category. The first three of the sequence satisfy the 45 hour continuing education requirement for NYS Licensees -though all classes are also open to the public. Licensing requirements do not figure in bankers provision, though again the future of credit recommendations is tied into the policies of the association. At the level of the individual AIB chapter the outlook is quite obscure. In part, this is because a chapter like that in Albany, New York, simply does not have long enough experience with credit recommendations to assess their effect. In part, it is because a local chapter caters for quite different kinds of market, for example entry level people but also middle management. The Albany chapter has around 2,500 members, all employees of twenty six banks who underwrite the chapter by helping employees to pay course fees which may well cost four times as much as those in local colleges. Despite what might look like a considerable fee barrier, this chapter is clearly very busy, with 1,000 students on course during a nine month year, ninety per cent of enrolments on evening programmes in three hours classes, and using space sub-let from a local college. The banks seem not to pressure employees though they may support them by refunding fees on successful completion of a course. The employees work to pursue their career ambitions.

This chapter's programmes contained both distance learning and face-to-face packages, some with credit recommendations, but also a half way stage to recognising experiential learning: testing-out, the facility for an individual to review the book [of the course] in a matter of weeks and test right out of the programme by demonstrating that he or she has covered the ground and knows it. To test out requires enrolment at a fairly nominal fee, about thirty dollars. It is difficult to project the future shape of a thriving programme with all these elements. The active sponsorship and effective underwriting of programmes by banks indicates employer satisfaction. Even the bigger banks, which have in-house training more or less competitive with some chapter courses, support the chapter and send people on some of its other courses. Indeed, chapter courses probably have the weakest representation from the smallest banks with the most feeble in-house training. Not all the small banks, and even one or two of the larger ones, really understand that 'investing in an entry level person is going to be investing in employee retention', and some local banks experience extremely high turnover among entry level people.

Entry level people, very possibly without degrees, are the most likely to be interested in credit recommendations attached to chapter courses. But the exploding market in the Albany chapter's programme was courses for middle management, many of whom already have degrees and are not therefore

sensitive to credit recommendation. These courses are one day intensive training workshops and there 'we cannot keep up with demand because the banks know we are offering a very economical way ... 95 dollars as opposed to 600 plus dollars.' Because these courses are not over seven hours long, they cannot even carry credit recommendations. Banking education is not at all driven by licensing requirements, but, unlike the real estate business, it has the beginnings of industry rather than college accreditation, of credit which might focus on the criterion of job competence rather than mastering of academic skills and knowledge. At the grassroots, the level of the chapter, the fear was expressed that industry evaluation and college evaluation might tend to merge in such a way 'that we are taking away from the banking recognition [credibility with banks?] in order to satisfy the education recognition.'

The acceptability of college credit

There is no doubt that hundreds and hundreds of colleges have accepted and do accept credit recommended by ACE and USNY. Moreover, there is some evidence from the late seventies that around eighty five per cent of credit-carrying employees who sought it were being awarded credit by state colleges. So college admissions are influenced by credit recommendation, even though it requires counterfactual assumptions to say that the satisfied demand for campus-based learning has been raised above the level that would obtain without this kind of accreditation.

Adequate recognition of the value of employer-provided training depends on a chain of events: employer commitment to seek and finance evaluation and credit recommendations, successful evaluation and recommendation, effective employer advertisement of the benefit, motivation of individuals to go to college and college willingness to accept the recommendation. Although the employers we visited were very ready to play their part in this chain, the accrediting agencies reported that not all employers did make sure that it was known to all employees that a given course was recommended for credit. 'Sometimes it goes no further than the training manager.' Only one link in the chain has to fail and the whole operation is likely to fail totally. The accrediting agencies think that on the occasions that this link fails it is likely to be accidental. But they themselves take a very level, measured view of the prospects of large amounts of credit being accepted by all colleges, even if employers were to take to the idea of credit recommendation in a big way. They understand - even where they do not like - the varied reasons for college inhibitions about accepting credit recommendations. For instance, the accredited Business Schools tend to be extremely reluctant to

accept ACE credit recommendations, are indeed reluctant to work this closely with business and industry. There is a 'turf issue,' which is at the root of a lot of the resistance which both programmes experience in getting colleges and universities to accept recommendations. Reluctant colleges and universities feel that business has a responsibility to train but that it is increasingly poaching on their land, where they have a responsibility to teach, where they give degrees. The counter-trend derives from those colleges or disciplines which are weakest in the market. Those with the most difficulty recruiting are the most likely to accept credit recommendations. 'Increasingly, there are more and more colleges that accept credit recommendations. In part that has to do with the fact that colleges are suffering difficulties with enrolments of students, and they see this as a way to get them.' Of course, likelihood that a college will accept credit recommendations is not simply or invariably a function of market strength or weakness. 'The community college sector in this country is quite lively and a lot of that is because of the community college history generally: it has been very open. One other reason why there are more ... colleges accepting them ... is because there is so much education and training taking place in business and industry now ... it cannot be ignored.'

Conceivably, the use of college credit (the criteria and language of academic institutions) as a measuring instrument is a limiting factor on the spread of this kind of accreditation among employers. College credit is not related to the definition and measurement of job competences. ACE has had experience since the 1940s in accrediting military programmes, but even there it is only able to argue equivalence to some academic course, not to relate it to competence. Acceptability with colleges runs up against differences in their market situation, but also the deeply ingrained idiosyncrasy of such institutions. As one expert witness pointed out, there are important areas like management and business where it would be very hard to achieve an agreed national content towards which all would teach. By tradition, each American institution likes to go its own way, for example in the MBA; and this too works against any reliable and extensive acceptance of credit, especially by the strongest institutions. The same observer said quite bluntly that in industry/education collaboration 'accreditation is not the place to start.' He believes that employers can drive the education institutions to change what these institutions are willing to provide for them without involving the accreditation process. Any change in that is more likely to be an outcome than a source of change. 'I think corporations here are the ones that are going to drive the education and training system in our companies [rather than educational institutions and educators].'

We asked one detached expert to rate comparatively an equivalent amount of credit worth, say, half a degree, gained (i) through accredited employer-provided training, (ii) through professional qualification, and (iii) through attendance at an educational institution. He reckoned that the credit-recommended employer-provided training would generally be rated lowest, especially relative to attendance at the educational institution. However, he volunteered the view that the trend is away from that particular bias, that people are increasingly open to learning in a variety of alternative settings, and not just learning on employer courses.

Among our detached experts there was considerable agreement on the high cultural status and low political power of education institutions. They certainly believed that a considerable change was necessary in the United States, towards a recognition of the crucial importance of human resource development, of investing in people, for the future growth and international competitiveness of the American economy. That change was seen to require a policy shift

- by the President, by Congress, by policymakers

- and that shift depends most of all on getting the message heard and understood. It does not depend on educators, who are generally too busy worrying about survival, tenure and so forth. Employers, on the other hand, are capable of influencing politicians. But first they have to become more generally and more deeply convinced themselves.

The same detached observers were very clear that most people consider that there are strict limits on the extent to which accreditation of employer-provided training is likely to spread. On the whole, employers, like the observers, see it as a sideshow when it comes to education/industry collaboration or the national effort to develop its human resources. They all seem to believe that most companies will never think it worthwhile to get deeply into it, if at all.

Moreover, 'the colleges in this country might not want an over-abundance of training programmes that were accredited' because of the loss of fee income. Indeed, there are distinct attractions for colleges in arranging the division of labour between industry and education in a rather different and no less market-driven way, contract training. Where colleges work under contract to employers there is none of the duplication of effort which even we could see between area colleges and local employer associations competing head to head with similar courses. Instead, contract training offers careful articulation of the division of labour in the

form of reinforcement of employer effort by college effort (see College Board, 1983). When companies like Arthur D Little, Wang or McDonnell Douglas set up their own fully accredited, degree-awarding 'corporate colleges', or large and sophisticated internal training programmes, like NCR, Merrill Lynch or IBM, this was lost business for colleges. Credit recommendation could lead students to them, or it could be lost business. Training by contract is a more certain way of recapturing business, as Carol Aslanian puts it 'an enormously new and relatively untapped source of clientele for American colleges' (College Board, 1983, vii).

Another detached expert pointed to the launch of the National Technological University, where a number of big companies put up several million dollars for the best engineering professors to establish a not-for-profit organisation simply to deliver to the firms - by satellite or by mailing discs - all the flexibility that the firms want and without requiring them to pay for 'the chapel and the cheer-leader and the football team', i.e. at relatively low cost and high quality. Something similar could spread into management education because the educators do have something worth buying, they are hungry and they can, when pushed or lead, deliver in the way that employers require. Of course, these new delivery systems and new institutions 'will draw down revenue from traditional institutions.' It was notable how many ways were instanced to us in which college and universities were becoming more sensitive to employers. Some people think that in this growing, complex and multi-faceted relationship there is something slightly passé about college credit, a throwback to the model in which the individual enrolls on a face-to-face course on campus, with the accreditation of employer-provided training as the come-on. One person described such accreditation as 'a square peg in a round hole.'

The limitations of college credit

In the course of a series of interviews with well informed and extremely acute observers of American education and business, it became quite clear that the credit recommendation operation, in the context of the United States, suffers from a number of different limitations. It would be prudent for any British experiments with recommendation for college credit to decide whether and to what extent these limitations are likely to apply also in the United Kingdom.

Some of these limitations have already been referred to quite extensively while reviewing the business context of accreditation and American experience with the acceptability of credit. For example, the economics of the American college is such that colleges and disciplines that are not in

a particularly weak competitive position will be reluctant to grant very much credit. Instead of obliterating part of the market which they need to exploit, they may prefer other tactics, like contract training, which recover business which could otherwise be lost to the company trainers. It has also been pointed out that, even if colleges were invariably willing to grant credit and employers were all anxious to have their training evaluated for credit, the spread of this practice depends on all the links in the chain performing and the individual employees actually seeking to convert potential into actual credit. As with tuition aid, there is some evidence that information blockages and lack of counselling are major factors inhibiting uptake. It was striking that even where circumstances were extremely propitious, credit recommendation still tended not to work as well as expected. For example, McGraw-Hill in New York has a very positive attitude both to providing education and training opportunities for its workforce and to helping them onwards to on-campus learning. One hundred per cent refunds of tuition fees are available as well as credit recommendations from many in-house courses. But the actual use of these credits by employees in local colleges or anywhere is considerably less than was originally expected.

In addition, there are more complex factors at work which do not relate to features of the accreditation process like employer willingness, the motivation of individuals and the position of colleges. For example, the ABA, or local chapters of the AIB, seek credit recommendations for some courses, but the main thrust of its education and training effort is obviously elsewhere. Courses which are reviewed for ACE or USNY credit are mostly accepted, after review by academics who are generally professors of finance or holders of banking chairs. Courses which are rejected after evaluation are rejected on the ground that they are not equivalent to a college course. But rejections in ABA's own accreditation process are treated in a significantly different way. The course provider (employer or association or chapter) is usually given a period of time to make suggested changes, usually complies and is usually accredited thereafter. The industry accreditation process is concerned with job competence; college accreditation is concerned to identify equivalence to academic activities. The industry accreditation set up by ABA looks like the accreditation process that schools and universities go through. It begins with a specified self-evaluation to be conducted by an institution running a banking programme. There follows ABA selection of 'a team of pure professionals, and these peers are usually two bankers to one academician, assisted by a staff person from ABA - who serves not as a voting member of the team but in effect as secretary to the team - and chaired by a banker. Usually the bankers are

involved in similar types of schools outside the immediate region.' So there is an element of cross-regional moderation and on overwhelming element of professional/industry scrutiny.

It seems that in the United States the fraction of banking training which is in-house is much smaller than in the United Kingdom because it has 'such a hotch-potch of banking' ... 12,000 to 14,000 banks, some megabanks but also thousands of little 'Mom and Pa' shops that are community banks and do not really have training programmes. The in-house training of the big banks is not being accredited through ABA's own accreditation scheme. It is totally autonomous. The bigger banks make some use of AIB training, but it is the small banks who are the major users of it. Both college credit and industry accreditation are in the very early stages and effectively experimental. Industry accreditation was piloted in 1985 in four banking schools and five AIB chapters. Both forms of accreditation are ways of assuring standards.

The development of two different accreditation systems within one industry underlines one of the most fundamental tensions to be found in the very important field of quality assurance for training. This is the tension between job competence as the criterion of employer training and academic equivalence as a rival criterion. In banking this was very clearly articulated for us: 'We distinguish between educational, training and informational programmes. We define education as being a programme in which one builds on and broadens a person, and one proceeds from the less complex to the more complex and one builds on a knowledge base ... We distinguish that from the training programmes, which are skills-based, usually job specific, not readily transferable in too many instances. Training activities are much more predominant in the beginning and in the lower levels of one's professional development than, for example, in senior management ... Informational programmes are programmes that provide very valuable information that is needed, probably throughout; but it is information for decision-making and hence more necessary with the senior level of management. We realise that the distinction cannot always be clear cut, but it is a valid set of distinctions ... We are distinguishing between the skills training programmes and the educational programmes. What we are saying is that these educational programmes are really not too different from what you have in universities. The American Council on Education will review and acknowledge them. We have money and banking courses, accounting courses and we are not really equating what we define as training programmes with university programmes.' That last observation is particularly revealing. It is as though the really genuine training is that which cannot be comparable with university offerings. **Education is a planned**

learning programme providing knowledge, skills and attitudes which may inform all kinds of human activity rather than relating to a limited sphere of occupational activity. Vocational education is designed to prepare people for work in a particular occupation or group of occupations.

All this suggests that employer providers may always take the view that only a rather small part of what they do is going to be 'education', in principle likely to find an analogue in academic institutions and therefore appropriate for credit recommendation. It is not surprising that, by common consent, much of what they do will not convincingly translate into the language of academic training, will not fit onto that Procrustean bed without great distortion. The expert staff in the accrediting agencies are aware of the fundamental origins of this translation problem. One consequence of this realisation is that, very recently, ACE evaluation practice has tended to shift its focus towards competences and learning outcomes. In some part this has occurred because firms look at each other's credit recommendations and are unhappy about what look to be inexplicable discrepancies in credit recommendations between apparently similar courses. Partly in order to defuse this unease among companies, ACE is veering towards the terminology the businesses themselves use. But it is difficult for academic evaluators always to operate in this terminology and orientation meetings between the company and the review team can be difficult. This is no surprise since the problem may sometimes spring not from terminology but from the fundamentally different objectives of industrial training and academic training. Those who observe the difficulties at first hand are ready to admit that any reconciliation of non-academic content and criteria with the academic content in the same course would constitute 'a monumental task' and that 'we have not figured out a way to do that.' Standard practice in the agencies is to concentrate entirely on that for which academic analogues can be found. From a company viewpoint: 'the colleges here have taken a very narrow view' on the recognition of learning in non-collegiate settings. It was suggested that if the trend towards the business's way of looking at training were to continue then the education-driven nature of credit recommendation might be de-emphasised, and what might emerge would be some kind of co-equal status, a system respecting both industry and academic criteria [the feasibility and desirability of which is a proper subject for the next chapter].

There are straws in the wind. For instance, the American Management Association has a particularly interesting Master of Business Administration programme, reflecting a powerful orientation towards competency as the primary training

criterion (AMA 1981, 1983, 1986a and 1986b; Boyatzis, 1982). The AMA has already been granted the right to grant this Masters from the State of California, though not yet from the Board of Regents of New York State. It is a programme which is tailored to the individual's work experience and circumstances, with additional reading and discussion and supervision. CLEP, which is a challenge examination of sufficient academic respectability for good colleges to accept it, is based on competency. But the AMA's Masters takes the competency orientation one stage further and offers not advanced standing on a baccalaureate programme but a postgraduate degree.

It is almost as if there was an undesigned conspiracy between the factors which inhibit the development of recommendations for college credit. Taxed to explain why he regarded this accreditation as inconsequential, one of our expert witnesses described it as 'anathema to the ethos both of economic organisation in the United States in the broadest context, to the organisation of the relationship between the community and business in a more finite sense, and to the role of training in employer institutions in a very particular sense. Not only is it small but the odds against it making any further penetration into employer institutions are enormous.'

This same observer's off-the-cuff analysis was such an astonishing tour d'horizon that it is better left in the vigour of the original. It began with the workings of the labour market. 'The labour market here is a very flexible item .. there is very little accreditation in our labour market ... We have accreditation for professionals, some of which is self-imposed, some of it imposed for public safety ... pilots, doctors ... the imposition of licensing for lawyers and so on is really self-imposed ... it's a creation of the guilds, an exclusionary practice. The ethos of the United States, however, is that you should be able to do anything anybody is willing to pay you to do and that is really the way the labour market works.'

'There is a general bias against accreditation because it is a barrier to upward mobility in the view of most Americans ... and not the route [for upward mobility] ... In my view, the way to understand this is that in the US earnings and career mobility, or lifetime earnings mobility, largely resides in [depends on] the job not in the individual ... and if you look at the data we have on the impact of formal education on the variation in earnings among Americans it shows that it accounts for no more than 15 or 16 per cent [of variations] in lifetime earnings among all Americans. It is relatively unimportant. In spite of that, Americans think that education is very important because it is one of the

only things that one can do for oneself that allows upward mobility. It has status attached in society. It is very difficult to find status differentials that are not completely material, that is, in terms of wealth. It is a weaker one [differential] all the time because we have run out of string, everybody is educated in the US now ... Among Americans there is an identification with work which is very strong, and status [is] associated with work, and earnings associated with work and so on ... I get the impression that in Europe and in Britain the idea of student means 'not working.' In the United States it doesn't mean that at all. Schooling is something one does in conjunction with work here, more and more as a matter of fact. In this economic system, earnings and status reside in the job, learning resides in the job ... learning on-the-job in the broadest sense is what supplies the remaining explanation for that variation in earnings among Americans. The way you get ahead in the US you get a job and then leverage that into the next. The idea of accrediting one's way through the system would be threatening to most Americans because most of them feel that would exclude them - the low income Americans.'

At this point, we asked why - if so many Americans have so much education - it should exclude them. 'Because education is not the way you get a job. It's a Catch 22. Nobody wants to be barred from a job because they do not have enough education. People get angry about that. So ... if jobs were accredited it would restrain employers from hiring at least wage, and restrain employers from figuring out whatever it was they needed and then taking whatever was available and turning it into that, which is really the way the system works here. On the other hand, it would stop most people from getting jobs for which - if the jobs were accredited - they couldn't qualify. I can't think of a job I've had that, if somebody had really sat down and decided what you were supposed to know to do the job, I would have got the job ... To a certain extent the thinking is perverse in that, by putting all the power in the job in this system, we give all the control to the employer. In Europe there is a different political hook-up and that's really the basis of the difference. The United States is a much more conservative nation than European nations are.'

This 'different political hook-up' was no doubt assumed by all those with whom we spoke. To have the assumption spelled out proved particularly helpful because it integrated in one coherent explanation many disparate factors which had been mentioned here or there but remained ad hoc. The workings of the labour market were advanced as one major reason for accreditation of employer-provided training not working on any significant scale in the United States. The second reason which was advanced for this accreditation not working

was the 'tie-back to the broader political reality, the American system we struggled for after the Great Depression, and this system is really a product of the Great Depression, [of] trying to figure a way - as a result of the massive failure of the American economy - to maintain some balance between public and private power. The resultant compromise was that, as a result of Keynesian economics, we found the way out was, the government would manage the economy by manipulating overall economic aggregates and never lay its hand on the economic system except in the interest of public safety. We run the economy by macro-economic policy.

Micro-economic policy in the United States is a very dangerous idea. It comes up every six or seven years and it is soundly dropped and sent out of the door. Maintaining that separation between public and private power is really a very powerful political reality in the American system, and the notion of accrediting employer training runs squarely in the face of that, in political terms it's almost - not unrealistic - it damn near falls over into being laughable. Before that ever happened there would be a socialisation of capital in the United States. If there is ever enough leverage in the American political system to make that kind of penetration into employer settings, it would come as a result of massive failure on the capital side and that's where the intervention would come first. We would then become - 'Europeanised' would be the way people would see it. Then somewhere down the road the training thing would fall into place like everything else, like the domino process.

The reason the issue comes up now is that we have built a very large set of public and not-for-profit institutions in the United States after the Great Depression to handle the poor, unemployed and disenfranchised. The Great Society in the Johnson Administration attempted to cure poverty, to wage a war on poverty here, and as a result of that we made those institutions still larger - public health, education, welfare, US Department of Labor and so on. We created a sizeable set of public, in broad terms, human resource development institutions. Also, because of the baby boom demography in the US, we built huge education and training systems between the early sixties and the late seventies.' These baby boomers are now in the workplace, and 'those institutions - which are very large, have very powerful constituencies and are very closely connected to the Democratic Party and organised labour in the US - are losing clientele at a fairly rapid rate. They are looking for a new mission' and have discovered it. 'In the sixties the American human resource agenda was essentially to continue the traditional relationship between the economy and the government, which is to say that the human resource agenda of government and

public and not-for-profit institutions was to worry about those who did not share in the largesse of the larger American economy. The mainstream workforce was left alone and got its training on-the-job, largely informally.

Now the issue in the US is no longer those who do not share the Golden Eggs. The issue is the Goose. So, suddenly, it is no longer minorities and blacks and females and handicapped people and the unemployed. It's everybody that seems at stake: people who are employed. Competitiveness is the issue, not redistribution of income. All those public and no-for-profit institutions are trying to latch on to the competitiveness banner. They are saying that we need to have more regulation and spending for education and training - and for public and not-for-profit institutions - because if we do not the American economy will fail.

In order to make the argument they ... assert first, that the training is not taking place in employer institutions. It's insufficient ... We pay so little attention to the internal workings of the private economy in the United States to begin with. We barely know about capital flows. Nobody has the foggiest idea what kind of training goes on. In fact, most people suppose none does. In addition to that, human capital theory, as practised at the University of Chicago - which is a very conservative institution - that theory tends to tell you that it does not exist, that there is no training at the workplace. So economists will always tell you that it is not there and, if it is there, it's something you don't need to worry about. The first argument, if they can get away with it, is that it does not exist. They pretend that all the training and human resource development in the American economy occurs in schools and public institutions.' They do not mention experiential or on-the-job learning. 'Politicians say that the education system and the public job training system train Americans. They are simple unaware that people learn while they are doing their job. That thought is essentially a new idea. It is not to economists, of course, nor to people who are in industry ... in the US most economists know about informal on-the-job training. They know nothing about the formalised piece of that spectrum. First, they try to wink it away and, if they cannot wink it away, they say it is insufficient in size and quantity. Then they say it is discriminating in that it applies at the high end and not at the lower end. They very carefully ignore the informal on-the-job training and focus on the formalised training, which is somewhat leaderless. Or, in the third case, they simply argue that for efficiency's sake the mission ought to be turned over to an institution.

There is a natural set of political imperatives that drives the accreditation idea. The higher education people - the

higher education institution is the most elitist institution in the United States, I think many would agree - their initial response to all things [concerning human resource systems] is for some sort of certification or accreditation because they are the only human resource institution. They are the elite accreditor in the American economy.'

At this point in the argument a concrete illustration was introduced. It concerned a study done in the seventies when the rate of defence spending was increasing and there was anxiety about the possibility of consequential shortages of machinists and engineers. The National Science Foundation did a study showing that huge shortages could be expected. However, Congress took no action. Five years on, at the end of the decade, there were no evident shortages. NSF was asked to find out why the expected shortages had not shown up. It turned out that the occupational projections, upon which the shortage forecasts were based, had been accurate. Indeed, they were more robust than had been anticipated. On that score, the shortages should have been greater than forecast. Yet there were very few. They were starting to show up in the teaching of engineering in universities -there was a draw down from universities into companies - but they were very small. Looking deeper, NSF found that just over half of the people who had taken engineering jobs over the five years between forecast and post-mortem were not recent graduates of engineering training programmes. In fact, most of them did not have engineering degrees at all. They were chemists, physicists and a variety of other technical and scientific professionals who moved into engineering jobs. The problem with the original forecast was that NSF looked at engineers and machinists flowing through the accrediting system for those occupations, set those flows against overall demand and discovered a huge gap. The forecasting study forgot about the economy itself. The employers filled that gap by taking on something that approximated to what they needed.

The education people read the second NSF study as a demonstration that, at a constant quality, there was indeed a shortage as serious as had been forecast. It only disappeared if you forgot about quality. To the business people the opposite was the case. The second study was proof positive that there was no shortage. The charge was made that having low quality labour but giving it high quality names did not fool the markets in which these same manufacturers were being wiped out by the Japanese on design, quality and price. Business representatives answered this charge by pointing to engineering and manufacturing companies where all the design engineers were indeed graduate engineers. When the companies needed an engineer with a strong theoretical base they went out and bought one. But otherwise, where they

did not need such a person, they trained people up themselves.

There is a powerful view that accreditation would be counterproductive, a disbenefit, because it would inhibit precisely these selectively flexible ways of dealing with personnel problems. It would be a radical change and one not justified by fairly marginal benefits and some disbenefits. It might, for instance, be a more cost-effective approach to improve the quality of university engineering programmes to produce better design engineers and better theoretical engineers.

The sceptics about accreditation readily acknowledge that there is an important problem in assuring the quality of employer-provided training. They do not see accreditation as the answer. Some of our expert witnesses saw it as a small part of the answer; others would not concede even that. It seems to be the flexibility of employer-provided training and its integration in personnel and production policy which are seen to be at risk with accreditation. 'The accreditation process tends to produce ... several standard products; and the training that works best in general, in their [the employers'] judgement - in large part anyway - is the training that occurs closest to the point of production, closest to the point of sale. That is, after all, where economic and technological change impact on us.'

The same observer who expounded to us the development of the American labour market and political system and their relevance for accreditation brought his analysis up to the present and hazarded some views on the future. 'Work experience is something that one gets and sells from job to job', and in his view that is still the most valuable thing to have in an over-supplied labour market like today's. Proven competence assured by somebody other than a past employer, through accreditation of that employer's training, seemed to him to be 'an idea which is just a square peg in a round hole.' He pointed out that if the idea is suggested to education people they think it a good idea. 'But they will say so with a certain amount of bitterness because what you are talking about is the line in American society that they are not allowed to cross.' By this he meant an institutional divide, but, more important, a culturally-established boundary which can only be understood with reference to American history.

The United States has 'a very locking system', which refers to the balance of power. Americans do not like any large institution, and they believe in managing such institutions through countervailing power. You set them against each other. 'In the sixties the institution out of favour was

private production [cf Galbraith]. There was a simple leaning to the left here against ... private capital. There was an association of ... companies in the private economy with the Vietnam war, napalm and so on, the control of government by large private power and so on ... and Big Labour nobody ever held much in favour ... the country became less and less blue-collar ... it's passé ... first the country sort of turns its nose away from Big Business as materialistic and inhuman ... that was all the counter-culture. The New Left was also very much opposed to Big Government, and I think that is a great part of what the Reagan revolution is. It's the old New Left, it's not Jerry Falwell and traditional right wing .. it's the New Leftist rebellion against large institutions.'

Against this political scenario, Europeans might need to be reminded that 'there is a basic American value system that believes in free market economics. We balance that against a powerful government.' For this reason a standardised and publicly accredited system of on-the-job training is utterly improbable. For it would be a massive interference with the operations of a free labour market, of a free production system and of the sovereignty of the employer as Americans see those things.

Would the prospects be equally bleak for either an employer-led system of accreditation of employer-provided training or for an equal partnership system (employers and educational institutions or, as in West Germany, employers and state governments)? The answer we received stressed the difference between American and British employers: 'different kettle of fish. Frankly, I am not sure what to think.' Instead, we were offered two more aperçus concerning American employers, which are not without application to their British counterparts. First, Congress was scrutinising a proposal from the Secretary of Labour, a tax credit for in-company training. Our expert pointed out that when there is a perceived problem with employer behaviour 'the classic response in the US is a tax credit. If you want business to do something you pull the tax lever. I frankly do not believe a tax credit would do any damn good. I think there will be massive substitution for existing training.' Second, he firmly believed that employers are anyway shifting focus, that 'as a general proposition in the American system what I think will happen is more and more attention will be paid to learning in the workplace and its relationship to competitiveness and the acceleration of adaption in the workplace.'

4. REFLECTIONS

Although the great bulk of interviewing time was devoted to an interrogation of people concerning their experience and their views of accreditation of employer-provided training in the United States, there were times during most interviews when we deliberately solicited reactions to our own ideas about other ways in which accreditation can be done, other reasons for doing it and the possibility in another country, the United Kingdom, of consequences different from those which follow from accreditation in the United States. This was an attempt to mobilise American experience directly in aid of British rather than American problems. The discussions were the result of heavy 'leading' by the interviewers. A certain colouring from the interviewers and their own views was inevitable. Among those we interviewed we entirely omitted, through oversight, one of the key interested parties, the colleges and universities who do, and those who do not accept ACE PONSI or USNY PONSI recommendations for credit. Missing this dimension, it is possible that our view is slightly overweighted towards the perspective of the employers as against the academics. For all these reasons, it seemed prudent to isolate the summary of these discussions from the 'straighter' reportage and to indicate the greater degree of colouring by describing the text as reflections rather than report.

Differences which matter

It was never our intention to try to copy American accreditation practice with respect to employer-provided training, but rather to learn from American experience. Differences were generally more apparent than similarities. The Americans outnumber the British by four to one and have thirty five times as much space within which to spread themselves. The British huddle together in what is, by comparison with the United States, just one extremely intimate and homogeneous community. Three quarters of the British read one daily newspaper or another, and they watch just four television channels. In the United States people live in widely separated clumps. Outside the main metropolitan centres, newspapers are poor to non-existent. Ignoring that important clumpiness, newspaper sales are still only 269 per 1000 people compared with 421 per 1000 in Britain. Moreover, some 20 million Americans are, on a very cautious definition, illiterate; and as many as 106 million are reckoned not to be able to read as well as 11th grade

secondary students. Britain is estimated to have two or three million adult illiterates. The greater heterogeneity of the American people, and the continental-scale territory they inhabit, might seem in themselves to be reasons to seek nationally-recognised systems for guaranteeing and making clear to anyone the levels of attainment which individuals have achieved, whether on campus or at work. But the keys to understanding American experience with accreditation actually seemed to lie elsewhere, and particularly in the differences between labour markets, industrial cultures, systems of government and higher education in the two countries.

Those we interviewed were, on the whole, biased in favour of people getting a great deal of education and even in favour of recognising employer-provided training for college credit. In spite of that, we were reinforced in our prior opinion that the Americans are still strongly attached to on-the-job learning (see Carnevale, 1983 and 1986) and not, in general, predisposed to the use of qualification as a prerequisite for getting a job. This is how their external and internal labour markets tend to work. Of course, Americans value education highly. The proportion of young people getting into higher education in the United States is roughly three times as high as it is in Britain. There are undoubtedly very large numbers of people of all ages in the British labour force who would have had a substantial amount of higher education if this country had chosen to have a mass higher education system of American proportions instead of the less generous provision which successive British governments of all political complexions have thought was quite enough. The potential and untapped market - those who are perfectly capable of degree level study - is undoubtedly large in a country as undereducated as the United Kingdom. On the other hand, the relatively low valuation put on post-school education in Britain, though it might be exaggerated by the behaviour of governments, almost certainly reflects a certain lack of popular interest, the Celts excepted. Such success as the two American accrediting agencies have had depends, in part, on their ability to leverage on the social status of education in American society. This would not be so easy in England. Indeed, it might be marginally more effective in England to seek economic rather than social leverage, stressing the potential of investment in quality-assured training for corporate productivity and profit and, for the individual, as a means of gaining advantage in the labour market.

Of course, British higher education does not have an extensive provision which is credit-based like that in the United States. There are exceptions, notably the Open University and the CNAA's Credit Accumulation and Transfer Scheme. Moreover, if higher education responds to very

strong urgings from the British government in Higher Education: Meeting the Challenge (HMSO 1987) it will soon begin to move faster than the present snail's pace towards curriculum structures which facilitate credit transfer. But it would be easy to miss the point. Even if Britain restructured the higher education curriculum quite rapidly, this would merely facilitate credit transfer and the recommendation of employment-based training for college or academic credit. The use of that facility would depend, as it does in the United States, on factors quite outside the control of educational establishments.

Not far back in the recent history of one employer whose courses are credit-recommended by one of the agencies, a change in business conditions - a sudden and major drop in turnover - aborted a perfectly satisfactory partnership with a university under which university credits awarded for success on the employer's training courses were combined with university credits from university courses taught on the employer's premises. Employer training itself can be very sensitive to the state of business, and credit-recommendation is probably even more marginal than the employer's marginal training. To the extent that recommendation for college credit spread in the United Kingdom, is there reason to believe that it would be less marginal, less vulnerable in difficult and cost-shaving times, than it is in the United States?

Many academic courses in the United Kingdom are already recognised by professional bodies so that successful completion gives exemption from part of a professional examination. It is common for academic training, in effect, to be granted professional credit. This is almost the obverse of recognition of employer-provided training for academic credit. In many courses in British polytechnics and universities, it would be disastrous for recruitment if the course were not approved by the appropriate professional body. Moreover, this approved academic training is woven into a pattern of professional induction and development, culminating usually in supervised practice for several years and rigorous testing for professional, i.e. job competence. By comparison, it is exceedingly rare for academic credit to be awarded for employer-provided training so that it counts towards an academic qualification, except where such training is sometimes counted in lieu of more formal entry qualifications. It is likely to be counted for eligibility rather than to grant advanced standing, i.e. to award a credit value which takes the student part-way towards an academic qualification before on-campus teaching begins. The fact that recognition for credit already exists in Britain in the education -> industry direction, and not really in the industry -> education direction, reveals the relative market

strength of the two types of training, the industrial and the academic. Converting higher education provision into a modularised and credit based form would in itself have no effect on the balance of market forces. It was clear in the United States that - apart from the regard of individuals for the social status of the graduate - market forces were a crucial determinant of the spread and significance of credit recommendations.

Not only are British structures in higher education and government, and British cultures in the workforce and the external labour market different from those in the United States, but the balance of market forces is different. The United Kingdom is neither behind nor in front of the United States. It is in a different position altogether. Employers behave differently in the United Kingdom; the pattern of penetration of occupational qualification into the labour market is different; the attitudes of individuals to education are different. These really are very different countries.

On certifying competence

In the United Kingdom it is necessary to agree what needs to be done, and only then how to do it. The operations of the two American accrediting agencies were an exercise in increasing the transparency of a tiny fraction of employer training economy. There seemed good reason to believe that this was being done well, within the limitation that the greater the admixture of training for job competence with academic-type training the greater the difficulty for evaluators in sifting out and clarifying the comparable, i.e. the academic content of employer training. However, the sharp perceptions and frankness of those with whom we talked set in relief the relatively minor nature of this achievement. No doubt it was appreciated by colleges in relatively weak market positions and by some individuals. But it was simply not addressing the major issues of how to increase the job competence of the workforce, how to produce a more efficient division of labour between training by employers and training by colleges, and how to improve the relationship between competence and qualification.

In the United Kingdom it is increasingly recognised in industry that (i) we have to induce a much greater desire to learn in the population at large and particularly in the workforce, and that (ii) we have to increase dramatically the job competence of British managers and of the whole workforce. It is generally agreed that, if there is a difference, then in the United States the desire to learn off-the-job and on-the-job is stronger than it is in Britain. Increasing the transparency of one part (the academic part)

of the most formal part of employer training might encourage some British employees to seek more training. It could only be one device among a great raft of initiatives all designed to shift the attitudes and behaviour of British workers. Any wholesale attempt to engineer a colonisation of formal employer training by the criteria and forms appropriate to academic training would be completely ill-advised and anyway doomed to failure.

One interviewee did direct our attention away from product to process. One of the more important pieces of information for an employer is the mixture of motivation and of capacity to learn which an employee has. This mixture is a key indicator of trainability and of the likelihood of a good corporate return on further investment in training. One of the benefits which may come from recommending employer training for college credit is that it may encourage some employees - perhaps only a few, but not an entirely predictable sample of all to whom tuition aid is available - to engage in further education and training. In gaining and using college credits the employee is demonstrating this motivation and capacity to learn. The demonstration (process) may be more important to the employer than what is learned (product).

Perhaps there is a parallel with the experience of British employers with the Youth Opportunities Programme and its successor the Youth Training Scheme. For many years the autumn evaluation revealed that trainees who were offered jobs by their sponsoring employer were as likely to have little or no school-based educational qualifications as to have them. The link between educational qualification and success in obtaining employment is so regular and strong that its absence must attract attention. What is the explanation of this unusual phenomenon? It is almost certainly related to the fact that since 1978 - the inception of the Youth Opportunities Programme - British employers have had experience with more and more young people of taking them on first for a year, and now for two years, without commitment but in a situation where they have ample opportunity during everyday work to assess their motivation and capacity to learn. What has mattered for many sponsoring employers has not been the starting or even the ending level of attainment of these YOP or YTS trainees, but their capacity to learn, to become more productive. It is this progress, more than scholastic attainment measures, which indicates potential value-added from an investment in future training. Similarly, with adults, it may well be that one of the best justifications for schemes to recommend college credit is the evidence which take-up provides as to motivation and capacity to learn, as long as the employer can be reasonably sure of translating that motivation and that capacity into learning to do a job competently.

The employer wants a competent employee. It is a moot point whether he also wants one whose job competence is validated and quality-assured in such a way that if the person moves from firm to firm the job competence qualification has the validity and reliability of a good academic qualification. A significant fraction of the national workforce is occupationally mobile. In the words of one company training manager: 'We are a very free society in the US as in GB. Our people go from organisation to organisation. We cannot - much as we would like to with some people - put a ball and chain on their leg; that was ruled out about 120 years ago in this country.' The trends in technological and organisational change, and in the structure of the national and international economy, all suggest that this mobility will tend to and ought to increase. If that is the situation, there is a case for contriving a competence-driven labour market. This would only be a qualification-driven external labour market if qualification could be reliably tied to competence - as it is in some professions and in just a few of our modernised apprenticeships and traineeships. British employers are not going to want a qualification-driven labour market if qualification is academic qualification.

The business of ACE PONSI and USNY PONSI is to translate a fragment of employer training into academic qualification terms. No one who was interviewed pretended that this was certifying job competence. That process can be formal in the United States, for example in some professions, or uses other means, for example INPO training accreditation and the beginnings of industry accreditation in banking.

One question discussed with interviewees was whether it would be technically feasible to marry the two forms of evaluating and accrediting learning - industry or occupational accreditation and academic accreditation - given that each had its own criterion (job competence for one and mastery of academic skills and fields of knowledge for the other) and its own language (of task performance for one, of academic mastery for the other). It was generally acknowledged that there were grey in-between areas, but that at the polar extremes (i) we were talking about different kinds of competence and that (ii) what counts as evidence of that competence and of the learning which produces it is quite different at work and on campus. In one case the criterion question is: can he do the job? In the other case it is: has he mastered the body of knowledge?

Efficiency through complementarity

There may well be a case for introducing a British variant of recommendation for college credit, even if its extent were to

remain as limited as it seems likely to remain in the United States. Where it is feasible, the cost of doing this need not be great and there are tangible benefits available in terms of closer education/industry collaboration and encouragement of employees to undertake more systematic learning. But the larger issue, which was uncovered in many discussions, was how to define and establish an efficient relationship between the two forms of training, the industrial/occupational variety and the academic. In the United States, as in the United Kingdom, this relationship seemed to be complex and, as a whole, unmanaged. Its complexity was the net outcome of a variety of forces, licensing by government, self-interest and more altrustic inclinations among occupational groups, entrepreneurship from private and public educational institutions, and the need of employers to skill and reskill the workforce. The balance of these forces has clearly been somewhat different from industry to industry, occupation to occupation, even from place to place, as it has been in the United Kingdom. The result is a relationship between industrial and academic training which ranges from very intricate and tightly managed (some professions or contract training by colleges for employers) through loose and incoherent (whether non-market or market provision, and the most common state) to completely non-existent. There are many initiatives to change the relationship through local industry/education partnerships, federal or state programmes, the activities of bodies like the National Institute for Work and Learning and the College Board and, indeed, the American Council on Education and New York State's Board of Regents. But the sum of these initiatives is not a coherent and systematic effort to manage the relationship, and this by itself may be food for thought in the United Kingdom.

Time and again our discussions came back to the fact that - with some notable exceptions, chiefly in the area of professional training - there is no credit which really reflects competence to do a job. What the academics understand by qualification is generally not vocational qualification in the sense of capacity to perform a job to a prescribed standard but ability to operate in an academic discipline or field of knowledge at a prescribed level. Since the knowledge worker is the key worker in an information economy, industry has to recognise that the understanding which can be acquired through good academic training is an absolutely vital and necessary foundation for the training of a competent employee. Wherever this kind of academic foundation is acquired, on campus or at an employer's establishment or through distance learning, it is not merely right but essential that it be evaluated, certified and described in a standard way. It is necessary to use common criteria for assessment and a common language

to describe attainment. It is only when credit-recommending agencies attempt to evaluate employer training which is focussed not on academic mastery but on job competence that real problems occur. Academic criteria no longer apply, the language of semester hours and upper and lower division baccalaureate becomes less and less meaningful and information is lost in translation. Information is important, and so is the effort to reduce information costs. USNY and ACE credit recommendations do inform, do make some kinds of employer training transparent to the academic world and they do reduce the information costs of all users. If they stray into pure industrial or occupational training, tightly focussed on job competence, the reverse applies: they misinform, do not make the training transparent and raise information costs. That suggests a real need to do for industrial training what the agencies have demonstrated can be done for the essentially academic training carried out by employers instead of on campus. As Clendon and Yorke demonstrated in CONTACT Paper No 2 (1986), employees have a significantly stronger inclination than their employers towards training which results in qualification, and this is true for highly qualified as well as less qualified employees. If the objective is to increase employee motivation to learn, then accreditation of employer-provided training courses - especially through a competence-driven qualification system - could be a useful lever.

There has always been productive interaction in both countries between industry and education. The question is whether there are structures which can help to make such interaction more common and more productive without in any way impairing the peculiar contribution which both employment-based training and academic training can make to 'formation' - the English word whose meaning can be derived from its French lookalike, signifying the development of a fully competent worker. Recommendation for college credit, by itself, risks an unbalanced approach to one important facet of formation, the assurance of quality. If the relation between industry and education is to work in a complementary fashion, with an efficient division of labour between two different but equally important partners, mastering of academic disciplines and fields of knowledge should not be the sole criterion of worth. Somehow - and this is matter for the concluding part - job competence needs to be recognised in qualification as a complement to the academic criterion of worth.

Converting random to systematic relation: some pointers

In the United States there are many forms of accreditation and many agencies in the business. Some interviewees were enthusiastic about the idea of companies and business schools

agreeing accreditation of in-house management training for the MBA, including project work taken out of a normal workload and some assessment of experiential learning. Examples were offered of universities 'doing it their own way', for instance by evaluating a person's portfolio and looking at evidence of experiential learning; and, of course, the American Management Association's Masters programme was referred to. But all pointed out that these were only pieces of what would be needed and that, though it would be technically feasible to do it, the United States showed few signs of opting for any national approach.

In recommending employment-based training for credit there are really only two agencies, and because of their partnership during the formative years the two agencies are still very close together in their procedures and practice. In practice, there is nothing quite like a binary divide between, say, state universities and community colleges on the one side and private institutions on the other. Perhaps any British initiative starting now, if a single national agency proved to be out of reach, would have to take account of the British binary line and build a system of credit recommendation in the university sector compatible with the credit accumulation and transfer scheme which CNAA is building. It seems doubtful that the British could afford the luxury of more than two initiatives when two (originally one) is enough in the United States.

In many respects and for many reasons the United States cannot be treated as an exemplar for the United Kingdom. Indeed, the unsolved problems perceived by Americans are sometimes instantly recognisable to the British as their own problems. For instance, one of the expert witnesses expressed the view that, instead of introducing an ineffective tax credit, the federal government should spend very much less than it would thereby lose in tax revenues on a Training Research and Development Institution to investigate workplace training and its relationship to all other forms of training. He felt that in this respect the United States 'is probably in a worse situation than anybody'. Whether or not that is strictly true, it is the case that some of its major competitors do have national institutions to take a long view, to develop on all-embracing strategy and to carry out research and development. This desire for 'a Human Capital Institute' reflects the tendency in the market economies to underdevelop institutions, structures and systems which are, in effect, quasi-collective goods and which need public or parafiscal financing. In like manner, quality assurance cannot safely be left to the market nor to the unregulated attentions of self-interested occupational groups or self-interested academic institutions. It would need far more thorough investigation than was

possible in a one week visit; but it could be that the lesson of American experience with accreditation of employer-provided training is more 'how not to do it' than 'how to do it'. Recommendation for college credit, as far as it goes, may be worth adaptive imitation. But the larger issue of assuring the quality and inducing the right quantity of employer training is virtually unaffected by such accreditation. A coherent system of industry or occupational credit which assured the quality of claimed competence was not on display, only some fragments. This country has been moving towards such a system for several years. It could be the more valuable goal for a country like the United Kingdom, albeit with college credit an an adjunct.

There was considerable debate with several interviewees concerning the education of managers. Was it possible for companies and for business schools to agree ways of defining and expressing managerial competence acceptable to each, so that all would understand what was being produced and what were their respective roles? Matters of syllabus, of structuring and inter-relating formal and work-based learning for re-inforcement, and even evaluation are all very important but still second-order problems. Their solution depends on prior success in agreeing that what a person can do (competence) is as important as what the person understands (academically). For employers, whether employees have degrees or not is of little significance compared with whether they can run a business successfully. It would matter much more whether or not they had degrees if the degrees betokened competence as well as understanding. For all the workforce, a genuinely interactive and equal industry/education partnership - not colonisation, not academicisation - would have a place for recommendation for college credit. But it would not be a big place relative to inter-related academic and industry-based training and structured task and job rotation (personnel development schemes) designed to assure competence and qualify people for jobs.

Those to whom we spoke readily accepted the ideal. But they were, in varying degrees, sceptical about the chances of getting far down that road in the United States. In the United States employers and employees recognise and prize training excellence, for example what one might call the IBM standard or the Xerox standard. The question is whether such excellence could be translated from a company-specific standard into a cross-company, cross-industry system. It would be a great thing to do this, but our interviewees could not see how. Those rare successes who 'covered both sides of the street' - adding a higher degree to their company training and experiential learning - may have gone from strength to strength. But they are individual exceptions who

surmounted this lack of an integrated industry/education qualification system. However, our interviewees could see more likelihood of sectoral or occupational exceptions, and that advance towards the ideal might be feasible on a much broader front in a European society and economy.

5. CONCLUSIONS AND RECOMMENDATIONS

In what ways is American experience with accreditation of employer-provided training applicable to the United Kingdom?

Would it be worthwhile establishing a similar system here?

What modifications would be required, and would it be best to set it up jointly between employers and educational institutions?

It was to help answer these questions that CONTACT commissioned the authors to visit the United States. That experience clarified for us a number of issues which are crucial to establishing a more efficiently complementary and transparent relationship between training provided by British employers and that provided by public sector or university academic institutions:

(1) Employers provide training in order to make people competent. What a person can do (competence) depends with increasing frequency on what that person understands (academically). In so far as it does, and employer-provided training addresses that kind of understanding, the training can be effectively evaluated for academic equivalence, i.e. using the criteria and language of academia. But there remains a great mass of employer-provided training, even for highly qualified employees, whose objectives are non-academic competences. The attempt to translate such training into academic terms is futile because it is likely to misinform and so to mislead. USNY PONSI and ACE PONSI give every appearance of doing a good job wherever the training being reviewed is really susceptible to academic evaluation. In industry and among detached observers the great weight of the opinion which we sampled was that the extension of this kind of accreditation would be very limited. This was not due to any operational inefficiencies, but to its prime objective and its basic design characteristics. Its prime objective is to ease access to and promote enrolment in academic institutions by recognising extracollegiate academic attainment.

(2) The United Kingdom is not 'a degree crazy country' on a par with the United States. Nevertheless, it would be foolish to underestimate the motivational gains

available to British employers from helping employees to get public recognition of essentially academic attainments. CONTACT Paper No 2 (Clendon and Yorke, 1986) uncovered some North West firms where employees were notably keener to improve their qualifications than their employers were to assist them. Moreover, some managements appeared not to appreciate the advantages to the firm of working with the grain of employee motivation rather than against it. Of course, the firms and employer associations which we visited in the United States were a very unrepresentative sample with respect to training, tuition reimbursement and human resource development in general. There was no sign that they were particularly failing in competitiveness or efficiency; and there was evidence of a strong employee and management bias towards learning of all kinds. It is difficult to believe that if more British firms were to catch this infection they would be seriously damaged thereby.

(3) Both the United States and the United Kingdom are in the midst of two profound demographic changes, the effect of which is to increase steadily the ratio of job-hungry and qualification-seeking older workers to first time job seekers. The great baby boom peaked in the United States in 1960, in Britain in 1964. The maximum size age cohorts are therefore the 27 year olds in America and the 23 year olds in Britain. Both countries are well into annual reductions in the intake of young first time job seekers into the labour force. On top of a 42 per cent fall in the US birth rate 1960-80, the number of full-time homemakers dropped from three quarters to one quarter of all married women. Both American and British women will continue to flood the labour market, many of them looking for qualifications which will help them to compete for jobs.

At the same time, in the United States, as in Britain, international competition is becoming more and more severe on domestic as well as overseas markets. It may well be that the mobility of the more highly trained and expensive individuals between jobs, occupations and employers is increasing (Carnevale, 1985). In this flux - increasing competition in skills markets as well as in product markets - it is difficult for employers or governments even to identify the appropriate quality and quantity of training to finance, never mind provide it. Faced with so much uncertainty, it is sound national strategy to arm the individual with greater power over her or his learning. This requires an increase in incentives to individuals to learn

systematically, improvement of private benefits from education and training, removal of rigidities from training markets - such as non-recognition and therefore non-portability of prior learning - and easier access to further education. Allied to many other measures - for instance, those propounded in 1984 in Competence and Competition (Hayes et al), in 1985 in A Challenge to Complacency (Coopers and Lybrand) and in 1986 in the Review of Vocational Qualifications (HMSO) - accreditation for academic credit, professional credit or for some new industry credit, can help to increase incentives, improve benefits, reduce rigidities and ease access.

(4) It was repeatedly argued to us that the American economy, like that of the United Kingdom, needs far more corporate investment in people (e.g. Carnevale, 1983; Eurich 1985), that educators by themselves cannot have very much influence on such investment, and that this investment depends crucially on employer attitudes. In sum, a more effective industry/education relation and greater corporate investment in people depend more on employer than education initiatives. Industry/education collaboration is diversifying in its forms. Within this diversity recommendation for college credit has its place, though it is not a large one. Quality assurance of all employer-provided training is a far more important issue for employers, especially when it is a matter of assuring job competence. The difference in objectives between industry and academia is often seen as the difference between production and distribution. 'The issue in the United States is no longer those who do not share the Golden Eggs. The issue is the Goose ... Competitiveness is the issue, not redistribution of income.'

(5) In relation to the very important problem of assuring the quality of employer-provided training, recommendation for college credit is certainly not seen as the answer. Indeed, this very academic form of accreditation is regarded by some as 'a square peg in a round hole.' It is even thought possible that it will tend to reduce the flexibility of employer-provided training when it is essential to increase that flexibility and to integrate it better with production and personnel policies. On this view, the best employer-provided training is done closest to the point of production or the point of sale, which is where technological and economic change really impact upon the economy. This may be an argument against inappropriate extensions of evaluation for college

credit rather than an argument against quality assurance of the bulk of employer-provided training.

There is no need to throw out the baby with the bath water. Employer-provided training can be closely related to the changing imperatives of production and marketing and its quality can be assured if greater attention is given to developing new and more extensive forms of what - for want of a better phrase - we would call 'industry credit'. If industry accreditation of many kinds of competency-based training were to spread outside its present occupational habitats, it would need to be efficiently related to professional credit - provided by the established professions - and to academic or college credit. Cases which we met in the United States, such as accreditation by the Institute of Nuclear Power Organizations or the beginnings of industry credit in banking, and much larger scale examples such as the West German competence certificates, like the facharbeiterbrief and the meisterbrief, are suggestive for extensions of the industry accreditation which is already available in the United Kingdom. Nothing in the American experience suggested that further development of industry credit necessarily involved a great and inert bureaucracy which would preclude the desirable sensitivity of so much employer training to production and marketing imperatives.

(6) There was some tendency amongst those we interviewed from accredited firms to be wary of initiatives which might constitute, in American terms, interference with the operations of a free labour market or with the freedom of employers to pursue production or marketing goals. But there was also a recognition that in Western Europe both labour markets and employers are somewhat different. It was pointed out that 'in the American system more and more attention will be paid to learning in the workplace and its relationship to competitiveness and the acceleration of adaption in the workplace.' This must be equally true in the United Kingdom. Any initiative towards either college or industry credit for employer-provided training which failed to assist that kind of refocussing would be a disastrous mistake. It is essential that such initiatives be undertaken with a strong employer lead and in partnership with occupational groups and educational institutions.

(7) We were repeatedly driven towards a series of closely-related conclusions:

that the real and major distinction between job competence and mastery of academic skills and of a body of academic knowledge should be maintained;

that in a knowledge economy the two must nevertheless be closely related;

that there is scope for different but related forms of accreditation of employer-provided training, reflecting either job competence or academic knowledge;

that these two forms, industry and college credit, will often be plaited or interleaved.

A good many UK vocational qualifications at present involve unnecessary overlaps and are wastefully repetitive, forcing people to go again through learning they have already mastered. The employee moving from firm to firm may experience this. He is forever dodging the snakes in order to get to the next ladder. But the failure to ensure that credit is given in one setting for what is learned in another also means that there is inefficient duplication of effort between employers and academia, for example in management development and training. If learning is recognised in compatible measures whatever the organisational setting, and can be counted towards the same qualification, it becomes additive and the process becomes more economical. Few enough resources are committed to systematic training in Britain, without unnecessary waste of what investment there is. The technical problem is how to arrange as efficiently as possible the complementarity and division of labour between job competence-based and academic accreditation.

(8) The accreditation issues which engaged us in discussions with American colleagues related both to college credit and to competence-based accreditation. There was an underlying concern from us about the role which accreditation might play, if properly engineered, in bringing into being external and internal labour markets which were more competence-driven than they often are today. Qualification would also need to be more certainly and more often tied to competence than is the case at present. We found a strong echo in the United States for these concerns. It was apparent in the emphasis in the American Management Association on competency as the primary training criterion and in INPO's training accreditation using an industry criterion of competence and intended to provide assurance as to job competence. In neither case was

the accreditation college driven.

In many industries and occupations, in both countries, it still has to be decided what is meant by competence. Many managers claim to know what they mean by competence; but either they do not say or they cannot say what they mean by it. It is this articulation which is needed for the portability and assurance of standards of competence in the form of credible industry credit.

At the level of the best training firms much of the evaluative work has been done. As one company trainer put it to us: 'We have to do needs analysis of everything we do ... to prove that the things we do are valuable to the company and to the participant ... we are constantly being evaluated, every single class, for relevancy, learning, satisfaction with the programme and adaptability back on the job.' What is so often lacking still is the sectoral or local and inter-sectoral collaboration between employers, as in German Chambers of Commerce, to take the lead in defining and testing to competence-based standards. Nobody denies that, as one moves up the qualification levels into professional and management areas, the jobs on which employer-provided training is predicated become (i) more and more discretionary and yet (ii) more and more embedded in teamwork. For both reasons it becomes increasingly difficult to assess individual performance in those jobs as the outcome of competency-based training. So assessment of success in basing training on a standard of competence tends to become less and less reliable. In extending accreditation up the qualification ladder, above routinised jobs, above skilled worker or technician levels, the key issue is whether the cost in terms of loss of reliability in the assessment of competence - which can only be done on the job - and loss of reliability in relating training to that competence is worth the gains in terms of employee motivation, commitment to corporate goals and, above all, productivity-enhancing learning. Perhaps those company trainers to whom we talked were unrepresentative. But, like British company trainers, they recognised the issue as one of the most important as well as one of the most vexing in the book, and not to be dodged. In the United States, as in Britain, there is a long way to go to build a comprehensive, i.e. cross-firm, cross-industry quality assurance system appropriate to training people for job competence which is at all comparable in its validity or reliability with the quality assurance system in academia.

In the light of the findings we report, and of the reflexions which these findings induced, we recommend two actions to CONTACT:

- that CONTACT gives serious consideration to establishing an agency to evaluate and recommend employer-provided training courses for academic credit. Such an agency should be established in close consultation with employers and their associations; and it should take advantage of the transbinary nature of CONTACT to recommend credit which would have currency in both public sector higher education and in the university sector. Its purpose would be broadly similar to that of the two American agencies, but its operations would necessarily be modified to suit the particular characteristics of the British system of higher education.

- that CONTACT enter into discussions with appropriate government departments and agencies, with national bodies representative of industry, of employer and occupational groupings, and with the National Council for Vocational Qualifications, concerning the development of industry credit and its relation to professional and to academic credit. CONTACT should take a lead in negotiating with these interested parties and consider offering itself as the centre for a research and development programme on competence-based accreditation of employer-provided training, i.e. industry credit, and its relation to academic credit.

APPENDIX 1: THE CONDUCT OF THE STUDY

The study was commissioned early in 1986. Fieldwork had to be completed before the end of March, even though full writing up could not begin until much later in the year. A programme of visits was arranged over five days, March 17-21 1986. Only a few weeks being available to set up the programme of visits, it was often impossible even to engage in a correspondence. The investigators were extremely fortunate to have, and could not have set up the programme in so short a time without the advice of Dr. Norman Kurland and Professor Stanley Nollen and the most generous assistance in arranging visits from Mrs. Sheila Murdick of the University of the State of New York's National Program on Noncollegiate Sponsored Instruction and Dr. Sylvia Galloway of the American Council on Education's Program on Noncollegiate Sponsored Instruction.

The very tight schedule, and differences in experience and situation between interviewees, made it impossible or unwise to attempt structured or even semi-structured interviews. The two investigators were able to send most interviewees a preliminary explanation of the purpose of the visit and investigation and who they were. Interviews were conducted on the basis of a series of leading issues.

These leading issues were:

- the role of accrediting agencies, initially and now, whether reactive or proactive
- why the agencies accredit
- divergences between theory and practice of accreditation
- validity of credits : their accuracy in representing these competences
- reliability of credits : their consistency in representing these competences
- internal and external labour market value of credits; and their value relative to certification from degree institutions or the professions
- administration and financing of accreditation and possible improvements

- extent to which accreditation depends on credit-based and modularised system of higher education as a prerequisite

- financial and other costs of accreditation to employers

- benefits of accreditation to employers and to employees

- employer motivation in seeking accreditation

- reasons for failure to achieve accreditation when sought, and for unwillingness of employers to seek accreditation

- recent and projected trends in accreditation

However, the investigators selected or emphasised issues according to the experience and position of the interviewee. They also seized any opportunity to test with interviewees perceptions and judgements already encountered. On the last day of the visits programme we arranged three interviews in New York City with no more notice than three hours in two cases and five minutes in another. Without exception, the very busy people being interviewed (often accompanied by several colleagues) were generous with their time, tolerant of our ignorance and hospitable in the enviable American tradition.

Interviews were almost entirely taped, and many interviewees provided us with a considerable range of documentation. In compiling this report, we relied most heavily on the interview tapes, but we also drew to some extent on notes and on the documentation, much of which is cited in the select bibliography.

It will be clear from this description that it was out of the question to attempt any systematic survey of participating employers, of benefiting employees, of agencies, of their personnel and of the appropriate literature. Since a purely qualitative, almost impressionistic and certainly non-definitive report was the only kind we could aim for, we decided to seek out people with especially sharp and well-informed perceptions of accreditation of employer-provided training in three categories: those who manage the accrediting agencies; those whose training programmes are accredited; and those who are detached from the accreditation process but in a position to assess its significance. These people were

<u>From accrediting agencies</u>

Dr. Sylvia W. Galloway, Program on Noncollegiate Sponsored Instruction, American Council on Education.

Mrs. Sheila Murdick, National Program on Noncollegiate Instruction, The University of the State of New York.

From employers with accredited training

Mr. James Pavlakis and Ms. Sylvia Gray, Training and Development Department, Chesapeake and Potomac Telephone Company.

Mr. Robert Mitchell, International Center for Training and Development, Xerox Corporation.

Ms. Anita Ramundo, Albany Chapter, Inc., American Institute of Banking.

Major Leigh Hunt, New York State Police Academy.

Mr. Anthony Yellen, Technical Training and Management Development, Ebasco Services Incorporated.

Mr. Libert V P Diaforli, Training and Educational Activities, McGraw-Hill, Inc.

Mr. Robert J. Morris and Miss Sally Phipps, Marsh and McLennan, Incorporated.

Ms. Carol Peterson, Education Division, National Association of Realtors.

Dr. Anthony P. Kowalski, Educational Planning, American Bankers Association.

Other experts

Mr. Richard A. Ungerer, National Institute for Work and Learning.

Dr. Anthony P. Carnevale, American Society for Training and Development.

Dr. Nell P. Eurich, Academy for Educational Development.

Mr. Harry F. Evarts, American Management Association.

Mr. Brian O'Reilly and Ms. Elena K. Morris, Office of Adult Learning Services, The College Board.

We wish to record our gratitude to all those mentioned above and to many more who less formally but materially assisted us. Except for quotations from or reference to documentary sources, we have not identified information or judgements to persons. We did not amend the conversational syntax of

interviews because the argument was not thereby obscured - was even clarified - and we could make patent the nature of our primary evidence. However, the entire report is very much a personal view of the two authors. If it contains any valuable information and insights, these are very largely attributable to those with whom we spoke. But our informants should certainly not be held responsible for any misperceptions or inaccuracies: those belong to us.

Eligibility

1 Organizations that do not grant college degrees are eligible to submit educational programs for review. Participation in the National Program is on a voluntary basis, with each organization choosing, in consultation with Program staff, those courses which it wishes to submit for evaluation.

2 Only educational programs or courses conducted on a formal basis and with official approval of the sponsoring organization will be considered. Courses must be under the control of the sponsoring organization. Informal on-the-job training and job experience will not be reviewed.

The following guidelines shall be used in selecting courses or programs for review:

(a) The material presented in each course must be on the postsecondary level.

(b) The instructors should be selected on the basis of their qualifications to teach the subject matter, including their formal education and experience.

(c) The course should serve people who can use the credit recommendations toward a postsecondary credential.

(d) Appropriate procedures (tests, projects, oral quizzes, etc) must be used in the courses to evaluate student performance. Correspondence and independent study courses must include a proctored examination administered under secure conditions.

(e) Intensive courses should be of at least five days duration (35-40 hours of instruction).

(f) Intensive technical courses involving laboratory or workshop exercises should be at least 10 days in length (70-80 hours of instruction).

(g) Courses conducted over an extended period of time should contain at least 30 hours of instruction.

(h) Individual courses that do not meet the above time requirements may be grouped together for purposes of review.

(i) Courses that have not been offered during the preceding five years will not be reviewed.

Documentation

3 Sponsoring organizations will submit information concerning the administration of their educational programs. On the basis of this information, Program staff will decide whether the organization demonstrates sufficient stability and control to present its courses for review. Information submitted will include a description of the administration of the training function, procedures for selecting and evaluating instructional staff, procedures for course development, evaluation, and revision, and procedures for insuring consistent quality in programs delivered at multiple locations. This submission will be a part of the Program's permanent record on the sponsoring organization.

4 Each participating organization must maintain permanent and official records of students' participation and performance in any course which is reviewed. The sponsoring organization must demonstrate the capability to store and retrieve student records for the period covered by the credit recommendations.

5 For the evaluation of courses involving classroom instruction the following information must be submitted:

(a) Course syllabus describing the objectives and content.

(b) Instructional materials used for the course (textbook, audiovisual materials, case studies, problems, etc).

(c) Required or suggested qualifications of course participants.

(d) Qualifications of instructional staff.

(e) Techniques used to evaluate student performance (including samples, if available).

(f) Duration of the course.

6 For courses and programs involving other instructional

approaches, e.g., self-paced or independent study courses, some of the foregoing information is neither appropriate nor relevant to the process. However, appropriate and available items must be provided in sufficient detail to allow each course to be judged by the review team.

Course Review

7 Preferably, each review session will be conducted at the training site of the sponsoring organization. Wherever the session is held, persons from the organization should be available to answer questions that arise during the review of the course materials and to describe the process by which the curriculum is developed, evaluated and revised.

Selection of Reviewers

8 In conducting course reviews, no fewer than three subject-matter specialists in the field under consideration will be used. The names of individuals to serve in this capacity will be solicited from postsecondary institutions, professional and educational associations, accrediting agencies, and noncollegiate organizations. In general, the review team will include one practitioner from a noncollegiate organization.

9 The following criteria will be considered in selecting course reviewers:

(a) Area of reviewer competence as evidenced by formal training and experience will closely approximate area of courses being reviewed.

(b) Preference will be given to reviewers who have had five years or more teaching experience (with the exception of the practitioner noted in 8 above).

(c) Preference will be given to reviewers with experience in curriculum development, e.g., membership on a curriculum committee (with the exception of the practitioner noted in 8 above).

(d) Preference will be given to reviewers who are generally receptive to granting credit for learning in noncollegiate settings.

Evaluative Criteria

10 In the exercise of their professional judgement, review team members will consider the following factors in

determining a credit recommendation:

(a) The subject matter of a course, its level of difficulty, and its applicability to a range of postsecondary programs. These factors are of primary importance.

(b) Distinctive aspects of noncollegiate education, including the background and selection of both instructors and students, the duration of a course, ongoing application of classroom learning in the students' work, and motivational factors.

(c) Duration and concentration of effort in relationship to the generally accepted practice for determining credit in postsecondary institutions. Normally, academic credit is assigned on the basis of one semester credit hour for each 15 classroom contact hours plus 30 hours of outside preparation or equivalent; one semester credit hour for each 30 hours of laboratory work plus necessary outside preparation or equivalent; one semester credit hour for not less than 45 hours of shop instruction (contact hours or equivalent). Credit recommendations made by reviewers shall not, however, be derived by a simple arithmetic conversion. Intensive courses offered by noncollegiate organizations do not necessarily require as much outside preparation as many regular college courses. Reviewers should consider the factors of pre- and post-course assignments, prior work-related experience, the concentrated nature of the learning experience, and the reinforcement of the course material gained in the subsequent work setting.

Credit Recommendations

11 Credit recommendations will be reported in the following categories:

(a) Units of Secondary Credit. This category describes course work of the type found in programs leading to a high school diploma. Course content would usually be applicable for credit in an elective area.

(b) Vocational Certificate. This category describes course work of the type normally found in nondegree (certificate) programs, which are usually a year or less in length and designed to provide students with occupational skills. They can also be found

in some curricula leading to associate degrees in applied science. Course content is specialized, and the accompanying shop, laboratory, or similar practical components emphasize procedural rather than analytical skills.

(c) Lower Division Baccalaureate/Associate Degree. This category describes course work of the type normally found in the first two years of a baccalaureate program and in programs leading to the Associate in Arts, the Associate in Science, The Associate in Applied Science degrees. The instruction stresses development of analytical abilities at the introductory level. Verbal, mathematical, and scientific concepts associated with an academic discipline are introduced, as are basic principles. Occupationally oriented courses in this category are normally designed to prepare a student to function as a technician in a particular field.

(d) Upper Division Baccalaureate. This category describes courses of the type found in the last two years of a baccalaureate program. The courses involve specialization of a theoretical or analytical nature beyond the introductory level. Successful performance by students normally requires prior study in the area.

(e) Graduate Degree. This category describes courses with content of the type found in graduate programs. These courses often require independent study, original research, critical analysis, and scholarly and professional application of the specialized knowledge or discipline. Students enrolled in such courses normally have completed baccalaureate work.

12 A credit recommendation will apply retroactively to the date the course was offered substantially in the same form as seen at the review. Procedures for reporting and recording students' successful completion of the course must extend to the point to which the credit recommendation is backdated. In no case shall recommendations be made retroactive beyond 10 years from the time of review.

Updating Recommendations

13 Credit recommendations will be kept current by the following procedures:

(a) At regular intervals, a participating organization will submit information on each course for which a credit recommendation has been established. An indication of a substantive change in a course will result in an ending date being assigned to the credit recommendation. A re-evaluation will be necessary for the new course to receive a credit recommendation.

(b) A credit recommendation will be valid for up to 10 years from the date of the course review, provided no substantial changes have been made in the course. At the end of this 10-year period, another onsite evaluation of the course must be conducted in order for the credit recommendation to continue to apply.

Publications

14 In the Program publications, course review results will be reported in displays containing the following information: name of course; organization course number, when available; location; length in contact hours and days or weeks; dates covered by the recommendation; statement of objectives; description of course content and instruction; credit recommendation in the appropriate category or categories and subject area(s); and date of review.

15 For courses which are assigned credit recommendations, results will be published. Results need not be published for courses where credit recommendations are not assigned, but these must be made available if requested by affected institutions or students.'

From Appendix B, College Credit Recommendations, (USNY 1985, pp 413-15).

BIBLIOGRAPHY

AMA (1981) Workbook for Documentation of Performance, New York: American Management Associations, Institute for Management Competency, The Competency Program.

AMA (1983) The AMA Competency Program, New York: American Management Associations, Institute of Management Competency.

AMA (1986a) AMA's Competency Development Laboratory, New York: American Management Association.

AMA (1986b) American Management Association, New York: American Management Association, brochure.

ASLANIAN, C B and BRICKELL, H M (1980) Americans in Transition: Life Changes as Reasons for Adult Learning, New York: College Entrance Examination Board.

BARTON, P E and the National Institute for Work and Learning (1982) Worklife Transitions: The Adult Learning Connection, New York: McGraw-Hill.

BOYATZIS, R C (1982) The Competent Manager, New York: John Wiley.

CARNEVALE, A P (1983) Human Capital: A High Yield Corporate Investment, Washington DC: American Society for Training and Development.

CARNEVALE, A P (1985) Jobs for the Nation: Challenges for a Society Based on Work, Alexandria VA: American Society for Training and Development.

CARNEVALE, A P (1986) 'The Learning Enterprise' in Training and Development Journal, January, Alexandria VA: American Society for Training and Development.

CARNEVALE, A P and GOLDSTEIN, H (1983) Employee Training: Its Changing Role and Analysis of New Data, Washington DC: American Society for Training and Development.

CLENDON, R and YORKE, D (1986) Towards Effective Contact, CONTACT Paper No. 2, Manchester: The Consortium for Advanced Continuing Education and Training.

COOPERS and LYBRAND ASSOCIATES (1985) A Challenge to Complacency: Changing attitudes to training, Sheffield: Manpower Services Commission and National Economic Development Office.

COLLEGE BOARD (1983) Training by Contract: College-Employer Profiles, New York: College Entrance Examination Board.

CPCU/IIA (1984a) Catalog 1984-1985, Malvern, PA: Chartered Property Casualty Underwriter and Insurance Institute of American Programs.

CPCU/IIA (1984b) Key Information for Prospective Students 1984-1985, Malvern, PA: Chartered Property Casualty Underwriter and Insurance Institute of America Programs.

EURICH, N P (1985) Corporate Classrooms, Princeton: Carnegie Foundation for the Advancement of Learning.

EVANS, N (1984) Post Education Society: Recognising Adults as Learners, Beckenham: Croom Helm.

HAYES, C, ANDERSON, A and FONDA, N (1984) Competence and Competition: Training and education in the Federal Republic of Germany, the United States and Japan, London: National Economic Development Office and Manpower Services Commission.

HMSO (1986) Review of Vocational Qualifications in England and Wales, A Report by the Working Group chaired by H G DeVILLE and set up by the Manpower Services Commission and the Department of Education and Science, London: Her Majesty's Stationery Office.

HMSO (1987) Higher Education: Meeting the Challenge, Cmnd 114, London: Her Majesty's Stationery Office.

JONES, W (1986) Distance Education in Sweden and Denmark, CONTACT Paper No. 3, Manchester: The Consortium for Advanced Continuing Education and Training.

McGARRAGHY, J J AND REILLY, K P (1981) 'College Credit for Corporate Training' in GOLD, G G (ed) Business and Higher Education: Towards New Alliances, San Francisco: Jossey-Bass.

McGRAW-HILL (1986) Evening Courses at McGraw-Hill, Spring/Summer '86, New York: McGraw-Hill Office Training Center, Human Resources Department.

MARSH and McLENNAN INCORPORATED (1986) Professional Development Program 1986, New York: Marsh and McLennan Incorporated, Human Resources Department.

MOON, R G Jr and HAWES, G R (eds) (1980) Developing New Adult Clienteles by Recognising Prior Learning, San Francisco: Jossey-Bass.

MURDICK, S and GROVER, A (n.d.) 'Using College Credit Standards to Evaluate Training Programs', National Program on Noncollegiate Sponsored Instruction, typescript.

SPILLE, H (1980) 'Credit for Learning Gained in Military Service or Employment' in MOON, R G Jr and HAWES, G R (eds) above.

SQUIRES, G (1986) Modularisation, CONTACT Paper No. 1, Manchester: The Consortium for Advanced Continuing Education and Training.

USNY (1985) College Credit Recommendations 1985-86 Edition : The Directory of the National Program on Noncollegiate Sponsored Instruction, Albany, New York: University of the State of New York, The State Education Department.

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